F G86 T46 LIBRARY OF CONGRESS.

Chap. F 6 8 6

Shelf 7 4 6

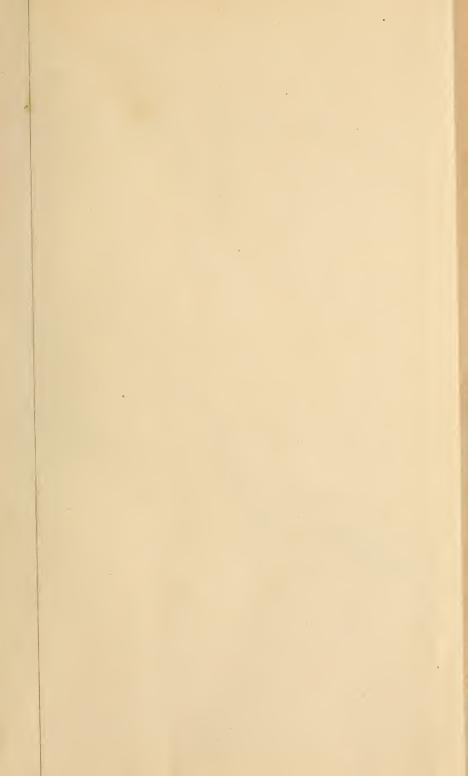
UNITED STATES OF AMERICA.





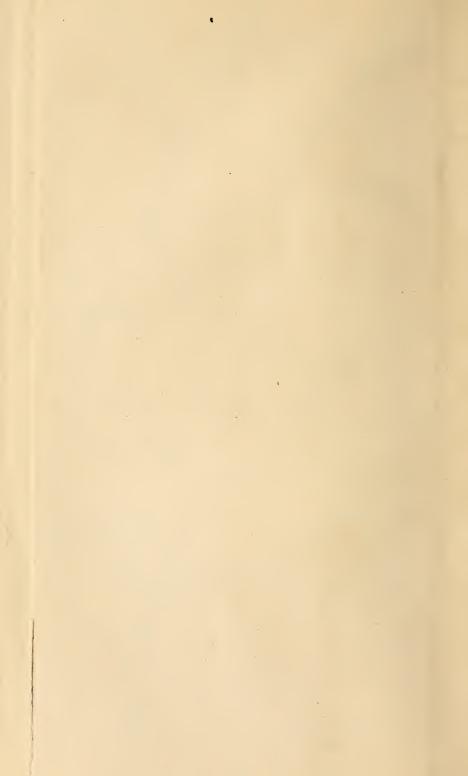












HOW AND WHERE

TO EARN A LIVING.

[THIRD EDITION.]

A Sketch

OF

"THE GARDEN OF THE WEST."

PRESENTING

. Facts worth Knowing

CONCERNING THE LANDS OF THE

ATCHISON, TOPEKA & SANTA FÉ RAILROAD COMPANY,

Southwestern Kansas.

By R. L. THOMAS.

BOSTON:

PUBLISHED BY THE COMPANY.

1878.

213 000





F686

TO THE READER.

This is a book of facts. Its aim is to give information that is valuable to everybody who is concerned with the question, "How and Where to Earn a Living." It does not indulge in theories, nor in fancies, but tells what has been done and what can be done in south-western Kansas. It is not a plea for emigration to the lands of the Atchison, Topeka & Santa Fé Railroad Company, but it is the declaration of the Company that their lands are worthy of the attention of everybody who is looking for a place where he can better his condition. This declaration is amply sustained by the testimony of disinterested parties, and by the affidavits of settlers. The larger part of the book is made up of reports of officers appointed by the State, and in no way the servants of the Company, except as their statements serve it. These statements may be considered reliable.

HOW AND WHERE TO EARN A LIVING.

WHOEVER is satisfied with merely getting a living will have no interest in these pages. This book is not intended for him. And if any reader wishes only to know how to earn a living, he need read no farther, for we give the answer in a single word: it is, Work. We have the very highest authority for this statement, besides the most convincing testimony of observation and experience. But if the question "Where will work pay best?" concerns the reader, he will be amply repaid by studying the various statements and figures which are here presented.

All we have to say here pertains to a country nearly two thousand miles away from the "stern and rock-bound coast" where our Pilgrim Fathers landed; but it is a goodly land, and what we shall have to say of it may persuade some of our readers to "go West." Lest, therefore, any of them should follow such persuasion, and be disappointed, we wish to be distinctly understood as not advising anything. We propose only to recite facts concerning Kansas in general, and concerning the Valley of the Arkansas River, in south-western Kansas, in particular. Readers of these facts and figures will act on their own judgment as to whether they had better stay in the East, or remove to this new country.

OUR DOCTRINE.

While we do not propose to give *advice*, we will declare our creed, which we believe contains sound doctrine.

- 1. If a man is getting a comfortable living for himself and his family where he is, and is happy and contented with that, he had better stay where he is.
- 2. If hard work doesn't agree with a man, or if he can't get along, at least for a few years, without the luxuries and conveniences of New England, he had better not go West. •
- 3. If one is liable to homesickness as soon as he gets out of sight of his "native rocks and hills," or if he is easily discouraged, the West is no place for him.
- 4. If a man cannot command capital enough to equip or stock a small farm, he had better not undertake business in Kansas.
 - 5. If one has not pluck and perseverance enough to win success where

everything but himself is favorable to him, he will surely fail "out West." Let him, if he hasn't these requisites, try to be content with his present condition, and make the best of it. By no means let him go West.

- 6. If, on the other hand, a man is not satisfied where he is, and feels that his efforts to get on in the world might be more successful in a new and fertile country, where land is cheap and crops are large, it is well worth while for him to consider carefully the claims of the Arkansas Valley, in Kansas.
- 7. If a man has "failed to get on" in the East, he had better take a true "account of stock" of himself before he begins anew. If the main cause of the failure is in himself, moving out West will only make the fact more apparent, and a greater failure will await him there. But if the conditions of the community where he now lives are mainly accountable for it—such as the high price of land and of labor, and the small return for work and capital,—a change will be advantageous to him. In the West, all the conditions of a fortune are favorable. Yet wealth, there as elsewhere, is won only by work, but work will win it every time. Courage and constancy and



capital are sure of a handsome profit to any one who will invest them in Kansas.

8. If, after reading what has been done there, one believes that he can do as well as any other man, and decides to try his fortune in the Arkansas Valley, we can respect his judgment, and give him credit for knowing a good thing when he sees it. For it is a fact that no section of our great country gives to the plucky pioneer so great a promise of health, wealth, and happiness.

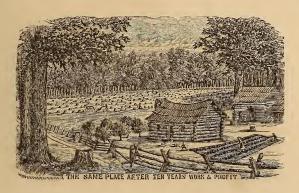
THE ARKANSAS VALLEY.

WHERE IT IS.

Look at the map given with this book, and you will see that the Arkansas Valley is in the south-western part of the State of Kansas. The Arkansas River, rising in the Rocky Mountains, flows in an easterly and south-easterly direction about three hundred miles through Kansas, into the Indian Terri-

tory, and on to the Mississippi. That part of the State which is watered by this great river is called the Arkansas Valley. Through the whole length of this valley, in Kansas, runs the Atchison, Topeka & Santa Fé Railroad. Edwards County, which is the present extreme western limit of cultivation in this valley, is only thirty-six hours' ride from Chicago and St. Louis, fifty hours' ride from Pittsburgh, Pa., and three days' ride from New York City.

The central position, geographically, that Kansas occupies, will be seen by the folding of a map of the United States, placing the eastern and western edges together, and folding it; then double it from north to south; open the map, and you will find that the folds have crossed each other near the centre of Kansas. By tracing the fold across the continent we find it follows the 38th parallel of north latitude, which strikes the Atlantic coast just a little north of Richmond, Va., and entirely south of Maryland, giving the latitude of central Kentucky and Virginia; and on the Pacific coast the fold strikes the ocean about one degree south of San Francisco. This practical illustration will show more forcibly than we could by the multiplication of



words that in the "Upper Arkansas Valley," in south-western Kansas, lies the "golden mean" climate of the continent of North America, the temperate line, equally distant from the Atlantic Ocean on the east, and the Pacific Ocean on the west,—from the cold regions on the north, with their long, severe winters, requiring the most arduous labor during the short summers to provide for, and the hot, enervating south. It forms a part of that remarkable section which lies between the 38th and 44th parallels of north latitude, and has been appropriately named the "Great Central Belt of Population, Commerce, and Wealth." Study the map of the United States, and you will find within these lines of latitude all the great commercial cities, and here concentrated the mass of the population, and the greater proportion of the agricultural, manufacturing, and commercial interests of the nation. Although embracing only one-fourth the area of the United States, the percentage of the population, of the industrial and commercial interests, of the taxable property, and of the newspapers, schools, and

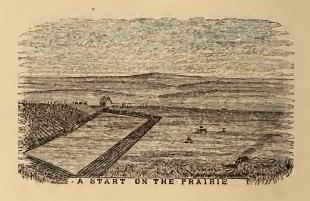
churches in this zone has steadily and uniformly increased. By the census of 1870, the Central Belt is found to contain two-thirds of the population, FOUR-FIFTHS of the real and personal property, THREE-FOURTHS of the schools, public libraries, and newspapers, and FOUR-FIFTHS of the churches of the entire country.

WHAT IT IS.

The Arkansas Valley has been justly called the "Garden of the Continent." As to its fertility and capacity for production as compared with other sections of the country, and with other parts of Kansas, we can safely say that leads them all. We refer the reader to the statistics given in another place, under the head of "Official Reports." We may mention here

ITS ATTRACTIVE FEATURES.

1. A LARGE BODY OF BEAUTIFUL, RICH BOTTOM-LAND. Bottom-land,



in all countries and in all ages, has been esteemed the most durable, productive, and valuable. The valley in proper, or bottom, is from ten to twenty miles in width. The higher lands upon either side are a kind of second bottom, or low, rolling prairies, with just enough undulation or swell to carry off the extra rainfalls. The soil of the valley proper, which is also marked by gentle swells, is chiefly a sandy loam, made up of such mineral elements as have been washed from the Rocky Mountains by the attrition of ages. It is a marked feature of this soil that it contains a much larger proportion of mineral matter than the prairie soils of Illinois and Iowa, which are chiefly vegetable mould. This is shown very plainly in the remarkable strength of the wheat and oat straw, which does not lodge or fall down, although it grows very rank, reaching six feet in height. To those accustomed to a murky soil, there appears to be in places in this valley too much sand, but the experience of our farmers is directly the opposite.

- 2. Its remarkable healthfulness. This is attributable largely to its altitude, near 1.500 feet above the level of the sea at Newton, where the railroad first enters the valley, and rising uniformly from seven to eight feet each mile, going west; reaching at Larned an altitude of 2,035 feet; at the west line of the State of Kansas, 3,425 feet; and at Pueblo, the present western terminus of the road, 4,764 feet. This altitude, with the gently-rolling surface of the country thoroughly drained, and the entire absence of stagnant water, or anything to breed malaria, secures a healthfulness and freedom from disease that alone make it one of the most attractive localities to make a home in.
- So important is the question of health, that life, even with wealth, is a continual agony without it. With health, industry, and prudence, all the blessings of life are attainable.

THE GOLDEN MEAN OF CLIMATE.

3. In the attractive features of the Arkansas Valley, we will class the



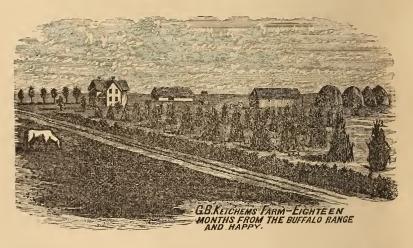
climate. There is a very general desire on the part of the people to get away from extremes,—to find the golden mean, the temperate line lying between heat and cold. It is apparent that the Arkansas Valley, lying along the 38th parallel of latitude, is far enough south to secure a mild climate; but to fully appreciate its attractive climate, one must understand that it is delightfully tempered, and made salubrious and healthy by the rising altitude. The climate of the valley has proved particularly beneficial to consumptives, and persons afflicted with affections of the throat, heart-disease, and dyspepsia. Many who have moved here in search of health, whose cases were considered almost hopeless East, have been restored, and many others have been very much benefited.

ELEVATION OF PRINCIPAL STATIONS ABOVE SEA LEVEL ON ATCHISON, TOPEKA & SANTA FÉ RAILROAD.

Station.	Feet.	Station.	Feet.
Kansas City Union Depot		Sterling	1,613
Atchison		Raymond	1,699
Valley Falls		Ellinwood	1.759
Topeka		Great Bend	
Carbondale		Larned	
Burlingame		Kinsley	
Osage City		Dodge City	
Reading		Lakin	
Emporia		Sargent	
Cottonwood		Granada	3.485
Florence		Las Animas	
Peabody		La Junta	
Newton		Rocky Ford	
Halstead		Apishapa	
Burrton		Napieste	
Hutchinson		Pueblo	

THE GREAT WHEAT COUNTRY.

The Arkansas Valley is the great wheat region of Kansas, and of the West. Though of the comparatively newest portion of the State—five of the nine counties embraced in the valley dating their organization back only to 1872, two to 1870, and two others to three years ago,—the wheat acreage



in these nine counties in 1877, as proved by the Report of the State Board of Agriculture, was nearly one-fourth that of the entire State, the increase over the previous year, 1876, as shown by the same authority, being nearly four times greater than the net increase of the whole of Kansas! In bushels, the results in the Arkansas Valley, as compared to the State, are still more striking. The wheat crop of the Arkansas Valley for 1877 equals one-fourth that of the entire State, while the increase of bushels in the valley is to the astonishing extent of twenty-three times the net increase of bushels in all

the State of Kansas. As if this wonderful showing was not all-sufficient to forever settle the question as to south-western Kansas' incomparable preëminence as the great wheat-raising section of the West, the average of the farthest south and newest counties in the State puts a clincher where it can never be displaced. The wheat average of Edwards County, the extreme southern limit of present cultivation in Kansas, as well as Pawnee County adjoining on the north, for 1877, is twenty-eight bushels per acre. Barton County comes next, with twenty-five bushels per acre; then Rice, with twenty-two; and next Reno, with nearly twenty. The other three counties were subjected to the last of the grasshopper visitation in the fall of 1876, and innumerable heavy rains the spring following; hence their average was considerably reduced. The average of the nine counties of the Arkansas Valley, in the aggregate, for 1877, was, however, seventeen bushels to the acre. In the light of results, theory is a waste of wind.

IT IS THE CHOICE OF SETTLERS.

Generally persons intending to settle in the West carefully canvass the claims of various States and sections before buying land. The lands of this company have been chosen from all others by many hundreds of purchasers. Kansas leads all other States in the ratio of increase of population, and returns from the section of Kansas through which the Atchison, Topeka & Santa Fé Railroad runs show that the lands here spoken of are the choice of settlers. In his report to the stockholders in 1874, President Nickerson says:-

The population is rapidly increasing along the road. Indeed, the ratio of increase is greater there than in any other part of the State. According to the tables of the last Report of the State Board of Agriculture, Kansas had, in 1870, a population of 364,234, and, in 1874, it had 530,367. The increase in the four years was 166,113, or about forty-six per cent. But the same tables show that in thirteen of the eighteen counties through which our road runs the increase was 41,221 (from 64,440 to 105,661), or more than sixty-four per cent.

We here present the figures which show the increase of the cultivated

area along our line. They are taken from the last Report of the State Board of Agriculture, and show the *growth of a single year*.

In the State at large, in 1873, there were 3,031,957 acres under cultivation. In 1874 there were 3,669,769 acres, an increase of 638,812 acres, or twentyone per cent. But in nine of the counties on our road the cultivated area, which in 1873 was 561,785 acres, had increased to 711,248 acres, an increase of 149,463 acres, or about thirty per cent. In the other counties, which are mostly new, the ratio is larger; but it is not reckoned here.

The same ratio of increase has been kept up since 1874, the Arkansas Valley leading all other sections of the country. The gain of 1875 over 1874, here, was 97,277 acres; of 1876 over 1875, 96,369 acres; 1877 over 1876, 257,310 acres; and the gain of 1878 over 1877 is still greater.

The advancement of the Arkansas Valley in the past five years would scarcely be credited, were it not for the complete verification in the official records of the State. There is no parallel to it upon the continent, and judging from the unequivocal indications, the progress the next five years will be even more remarkable.

SEE HOW IT GROWS.

The counties named here are those which lie in that portion of Kansas known as the Arkansas Valley, and which we might call the New Kansas, because eight years ago it was scarcely known, except as a part of the Great American Desert. It owes its development and growth entirely to the building of the Atchison, Topeka & Santa Fé Railroad.

Counties.	When Organ- ized.	Population in 1870.	Population in 1875.	Population in 1877.
Chase. Marion Butler. Harvey. Sedgwick. Sumner McPherson. Reno. Rice Barton. Rush. Pawnee. Edwards.	1865 1855 1872 1870 1871 1870 1872 1871 1872 1874 1872	1,975 768 3,035 1,095 22 738 5 2	3,116 5,907 9,852 5,046 8,310 4,925 6,205 5,112 2,453 2,090 451 1,006 234	5,050 10,251 15,054 8,698 13,414 13,251 11,242 13,871 6,279 5,389 2,467 4,486 905
		7,819	54,716	110,357

It will be noted from the above that from Reno, west, in 1870, there were but 186 people, the same territory in 1877 comprising the homes of 33,950 people. The gain in population in the Arkansas Valley in the one year 1877, over 1876, was upwards of 22,000; and the tremendous tide of immigration pouring in so steadily for months bids fair to render the increase of 1878 over 1877 even more remarkable.

The sale of the company's lands for the first four months of 1878 amounted to 89,158 acres, or 4,000 acres more than the sales of the whole year 1877. Besides these sales, the government has disposed of immense tracts of land during the same period. At the United States office in Larned, the sales for January, February, and March, 1878, were 306,416 acres. At Wichita land office, the sales were 162,609 acres in the same months. The aggregate of acres thus disposed of by the government at these two offices in the first quarter of the year is 469,025 acres. This shows an increase of 224,881 acres over the sales of 1877 for the first quarter. During 1877, the sales of the two offices aggregated 865,000 acres. These represent 8,500 claims, and an increase of 40,000 in population for the year, in the Arkansas Valley. Evidently this valley is the chosen spot of thousands for homes.

Such indisputable facts as here presented cannot but instantly put to flight all false fears any may entertain of being forced to live in the wilderness upon locating in the Arkansas Valley. There are neighbors on all sides, hard-working, intelligent farmers from every State in the Union. Schools are more abundant than in many sections of country ten times the age of

the valley. Churches dot the counties over, and civilization is the rule everywhere. The striking array of crop statistics from official records, given elsewhere, the marked increase of property, and unparalleled increase of population all prove it beyond dispute.

But as these homestead claims average 160 acres each, the record thus shows upwards of 2,000,000 acres of government land taken up in this valley in fifteen months. It is plain enough that all who are contemplating the preëmption of government land should prepare to act at once, or they will be left out in the cold. Those writing to A. S. Johnson, Topeka, Kansas, will receive by return mail a publication devoted to the matter of government lands, giving the different laws applying thereto, and much valuable information regarding its location, etc.

The following tables show the official record of the land department of the Atchison, Topeka & Santa Fé Railroad Company from the beginning of their sales.

TOTAL	SALES	FROM	MARCH	1,	1871,	то	JAN.	1,	1878.
-------	-------	------	-------	----	-------	----	------	----	-------

Year.	Acres.	Principal.	Interest.	Total.	Average Price per Acre.	No. of Sales.	No. of Acres to each Sale.
1871 1872 1873 1874 1875 1876 1877	71,801.51 45,328.81 133,507.30 200,459.96 75,415.33 122,201.17 85,047.78	\$425,013.75 269,627.66 748,977.25 900,973.30 416,409.85 665,455.17 423,477.49	\$185,531.48 109,545.23 289,401.82 327,459.68 181,809.66 255,568.98 111,626.16	\$610,545.23 379,172.89 1,038,379.07 1,228,432.98 598,219.51 921,024.15 535,103.65	\$5.91 5.90 5.61 4.54 5.59 5.44½ 4.98	472 277 830 1,261 656 893 607	152.33 164.79 160.84 159.96 114.97 136.82 140.11
Total,	733,761.86	\$3,849,934.47	\$1,460,943.01	\$5,310,877.48	5.243	4,996	146.84

The sales of January, February, March, and April, 1878, amounted to 89,158 acres, as before stated, making a total sale of 822,919 acres by this company since its organization.

SALES BY COUNTIES FROM MARCH 1, 1871, TO JAN. 1, 1878.

Counties.	Acres.	Counties.	Acres.
Osage	320.28	Brought forward	428,720.17
Lyon Wabaunsee	$270.99 \\ 2,641.66$	Rice	46,276.87 86,751.32
Morris Butler	5,768.93 24,445,30	Barton	78,033.34 1,250.18
Chase	13,523.87	Rush	3,394.28
Marion	136,130.83 70,769.87	Pawnee	60,302.63 $24,472.91$
Harvey	132,245.55 42,602.89	Ford	2,640.16
Sedgwick		Hodgeman	1,920.00
Carried forward	428,720.17	Total	733,761.86

SALES BY COUNTIES FROM MARCH 1, 1871, TO MAY 1, 1878.

Counties.	Acres.	Counties.	Acres.
Marion Harvey Barton Reno Pawnee McPherson Rice Sedgwick	137,370 135,985 98,872 96,530 75,942 71,330 60,040 44,580	Brought forward Chase Ford Morris. Pratt. Hodgeman Wabaunsee. Rush	776,269 13,880 13,340 5,840 3,230 2,680 2,640 4,410
Edwards Butler	30,330 25,290	OsageLyon	360 270
Carried forward	776,269	Total	822,919

LOCALITY	FROM	WHENCE	PURC	CHASE	RS	CAME	5, A	ND	NU	JMBER	\mathbf{OF}	ACRES
	PUR	CHASED	FROM	JAN.	1,	1877, T	O A	IAY	1,	1878.		

Where from.	No.	Acres.	Where from.	No.	Acres.
Illinois	314	43,000	Brought forward	1,271	167,380
Unknown	257	35,480	Massachusetts	5	560
Ohio	168	20,340	Maine	5	1,440
owa	132	18,380	W. Virginia	5	680
Pennsylvania	93	11,560	Georgiă	4	560
ndiana	82	10,620	Nebraska	4	560
lichigan	50	7,060	Maryland	4	640
Yew York	40	4,440	Canada	4	680
Foreign	34	3,080	New Jersey	4	560
Iissouri	31	3,760	Vermont	2	240
Cansas	27	3,600	Virginia	2	200
Visconsin	21	2,920	California	1	160
Iinnesota	9	1,040	Delaware	1	320
Kentucky	7	1,040	New Hampshire	1	160
Colorado	6	400	Connecticut	1	60
Carried forward	1,271	167,380	Total	1,314	174,200

BETTER CHANCES THAN EVER BEFORE.



ever before. The capacities of the country have been fully tested; it has been demonstrated to be one of the healthiest and best agricultural and stock-growing countries on the globe; its two thousand miles of railroad have brought every section of the State accessible to market; all the severe struggles, sacrifices, and hardships incidental to pioneer life have been undergone, and schools, churches, and social organizations have been established, and the rudimental work of a new and independent community perfected. A person with capital can buy improved farms or town property cheaper than he could make the same improvements himself. In all new countries property

is constantly changing hands for various causes. But a small portion of the original settlers retain their first possessions. They improve farms and sell them. The man of means can now obtain excellent real estate bargains in Kansas, while the poor man can find homesteads and opportunities of purchasing lands of railroad companies on easy terms. A poor man coming to Kansas to secure a farm must expect to endure hardships and do hard work for some years before he can lead a life of ease. The field here for enterprise is unlimited. It is a poor place to wait for "something to turn up," but an excellent place to turn up something. All the avenues to trade, the professions, agriculture, mechanism, and occupations of all kinds, are open, and inviting operatives. We are yet comparatively in our infancy, and the stranger who now comes here to seek a home can unite with us in celebrating our maturity.

ROOM ENOUGH YET.

The State of Kansas is four hundred miles long, from east to west, and two hundred miles wide; in other words, it is as long as the distance from Boston to Buffalo, and as wide as the distance from Boston to Albany.

The area of Kansas is 81,318 square miles. Only five States have a larger area. Kansas has more square miles than Ohio, Indiana, Delaware, and Connecticut combined. England and Scotland together contain 89,600 square miles, only 8,282 more than this single State. Kansas is an empire, — a giant still in its cradle. Of the 52,043,520 acres comprising its area, but two-thirds, 28,094,295 acres, or sixty-eight per cent., are at present in the organized counties; while of the latter amount only 5,595,305 acres are improved land, the rest being wild prairie.

It is difficult to realize the exact meaning of these figures. Men are not as familiar with millions as with fives. On the supposition that Pennsylvania and Ohio were thrown together, a similar statement would be that Pennsylvania was organized in counties, while Ohio was yet unsettled, and that only one eighth, thirteen per cent., of Pennsylvania, was under fence, or less than one-tenth, nine per cent., of both States. It is easier to distinguish the difference between the length of lines than between vast amounts expressed in figures.

LOOK AT THESE LINES.

Let us assume that a line one inch long represents 2,400,000 acres, the whole area of Kansas would be shown by a line twenty-two inches in length, the area of the organized counties by one of fifteen inches, and the improved land by one a fraction less than two inches long. Like the gentleman who did not leave Ireland because of "want," as he had plenty of it there, whatever this State may lack, it has a superabundance of unimproved territory. Ohio and Pennsylvania are not overcrowded with population. Their inhabitants apprehend no danger from starvation because of the inability of the soil to supply food. Kansas soil is as fertile as that of the best valleys in either,

and its average acre is richer than their average acre; so that it can certainly support as dense a population as they. Were its density equal to theirs, it would now have 6,000,000 inhabitants, and still possess the same room for in-comers enjoyed by the States named.

Adding the 18,443,920 acres of the now unorganized counties to the 28,004,295.01 acres remaining untouched by the hand of the husbandman, we have yet to people and cultivate 46,448,215 acres, or 80+ per cent. of the entire State area. Of this area, the Atchison, Topeka & Santa Fé Railroad Company have for sale more than 2,000,000 acres. The actual increase in acreage during the year just passed was 559,607. If the ratio of increase continues, the present generation will see all of Kansas as largely under cultivation as any State in the Union.

But while there is room enough yet, it is a fact well known to the government, as to all observing Western men, that the really valuable lands belonging to the general government are now limited, and that the remaining lands are rapidly being transferred to private hands,—the homesteader, preëmptor, and settler of the West. Outside of the Indian Territory, there remains but a limited supply of really good agricultural lands in all the West, the choicest of which, for climate, soil, and health are to be found in the great Valley of the Arkansas. Nearly all the available government lands of the Arkansas Valley, within the grant of the Atchison, Topeka & Santa Fé Railroad, are already taken up.

THE OFFICIAL REPORTS

Of the United States Department of Agriculture tell the Tale of the Wonderful Advancement of Kansas, as Compared to the Other States, as do the Official Reports of the State Board of Agriculture show the Remarkable Growth of the Arkansas Valley, as Compared with Other Portions of Kansas.

1871 vs. 1876.

In 1871, Kansas was the seventeenth State in the Union in the aggregate production of wheat; in 1876, Kansas was the eighth. In 1871, the ninth in corn; in 1876, the fifth. In 1871, the fifteenth in rye; in 1876, the first. In 1871, the fourteenth in oats; in 1876, the ninth. In 1871, the nineteenth in barley; in 1876, the fifth. These are the figures as taken from the official Reports of the United States Department of Agriculture, that for 1876 being the very latest report made by the department.

WHEAT.

Kansas had 13,816,000 more bushels of wheat in 1876 than in 1871, or 257,000 bushels in excess of the combined increase in the twenty-four States, Maine, New Hampshire, Vermont, Massachusetts, Rhode Island, Connecticut, New York, New Jersey, Pennsylvania, Delaware, Maryland, Virginia, Arkansas, Texas, Kentucky, Ohio, Michigan, Indiana, Illinois, Wisconsin, Minnesota, Iowa, Missouri, and Nebraska; the total wheat-crop of the United

States being 56,634,100 more bushels in 1876 than in 1871. The increase of wheat product in Kansas was greater than that of any other State in the Union. Illinois, Michigan, and Wisconsin had less wheat in 1876 than in 1871 by an aggregate of 4,000,000 bushels, while Iowa, with 1,181,542 more acres of wheat in 1876 than in 1871, had 800,000 bushels less.

In 1872, as per the official Report of the State Board of Agriculture, the entire wheat acreage of the nine counties now constituting the Arkansas Valley was 163 acres. The same authority shows that the winter wheat acreage now sown for the harvest of 1878 reaches the enormous figures of 358,690, and this, with the low estimate of 15,694 in spring wheat, makes the grand total of wheat acreage in the Arkansas Valley, in 1878, 374,384 to 163 acres all told in 1872. In 1877, the wheat average per acre in the five counties at the west end of the valley — Barton, Pawnee, Edwards, Ford and Rush — was 20 bushels, while that of the valley entire was 15 bushels to the acre. Of the nine counties of the Arkansas Valley, McPherson, with 125 acres of wheat in 1872, now has 88,266 acres. Harvey, with no wheat reported in 1872, now has 36,480 acres. Sedgwick, with 26 acres in 1872, now has 73,681 acres. Reno, with 2 acres in 1872, now has 52,972 acres. Rice, with ten acres in 1872, now has 42,189. Barton, with 18 acres in 1873,



now has 37,602 acres. Pawnee, with 33 acres in 1874, now has 18,968 acres. Edwards, with 206 acres in 1875, now has 3,112; and Rush, with 417 acres in 1875, now has 5,420 acres. The figures for the present acreage in Rice and Pawnee Counties are carefully-made estimates, the reports not being in at this writing. Cowley County has the greatest wheat acreage in the State, 88,587. Sumner County has 74,036 acres, and Butler 59,358 acres. The first two counties named are upon the Arkansas River, and the third county upon a tributary; and adding the acreage of these counties to that of the nine counties of the Arkansas Valley, and the total of wheat acreage of the twelve counties — all adjoining each other — is within a little over 100,000 bushels of the half of the entire wheat acreage of the State. The greatest increase of acreage of any county in the State is in Cowley, south-western Kansas, and

the greatest decrease is in Dickinson, western Kansas. The great wheat belt of Kansas, and the greatest wheat belt in prospective on the continent, is the Arkansas Valley, south-western Kansas.

The official Report of the department at Washington for 1876 shows that while Kansas was the eighth State in the Union in average of bushels of wheat per acre, her aggregate production was greater by 144,500 bushels than the combined wheat production of the seven States ranking her in acreage. Kansas was also the eighth State in the Union in aggregate production, and had higher average per acre than any of the seven States having greater production. The average cash value of the wheat crop per acre in Kansas in 1876, as shown by the department Report of that year, was \$12.55, or \$3.91 per acre more than Illinois, \$4.90 more than Minnesota, \$1.33 more than Indiana, \$7.06 more than Iowa, \$3.46 more than Wisconsin, \$4.16 more than Nebraska, 65 cents more than Oregon, \$2.55 more than Kentucky, \$4.76 more than Arkansas, and from \$2.95 to \$4.59 more than the Southern States generally. The average yield of wheat in the United States was 10.4 bushels to the acre, while that of Kansas, as shown by the same authority, was 14.6 bushels to the acre. The average value of wheat per acre in the United States was \$10.86, while that of Kansas was \$12.55.

These statements may readily be verified by those so choosing, by simply turning to pages 91 to 104 of the Report of the United States Department of Agriculture for 1876, issued late in the fall of 1877.

CORN.

The increase of the corn product of Kansas, 1876 over 1871, was greater than that of any State in the Union, or two and a half times greater than that of Illinois, - more by upwards of 10,000,000 bushels than Illinois and Ohio together; more by nearly 5,000,000 bushels than Iowa, Michigan, Wisconsin, and Minnesota combined, and nearly 20,000,000 more than Indiana, Missouri, New York, Pennsylvania, Maine, and California. In 1876, Kansas led the United States in average of corn per acre, 43.5, and her product in the aggregate was twenty-one times greater than that of the ten States following her in acreage. Fifth in aggregate of production, Kansas had ten times the number of bushels in New England entire; upwards of 6,000,000 bushels more than the Middle States; more by a half million bushels than the combined product of the ten States of New York, Connecticut, New Hampshire, Vermont, Maine, Massachusetts, Rhode Island, Michigan, Minnesota, and Nebraska, and one-third that of the entire South. The increase of the corn product of Kansas, 1877 over 1876, was something over forty per cent., and it is confidently believed that Kansas, again in 1877, led the United States in average per acre.

The average cash value of the corn crop per acre in Kansas, in 1876, was \$10.44, or \$2.94 more than Iowa, 28 cents more than Minnesota, 24 cents more than Indiana, \$2.89 more than Illinois, \$2.34 more than Nebraska, \$2.56 more than Missouri, \$1.08 more than Arkansas, and from \$1.24 to \$4.20 more

than the Southern States generally. The average yield of corn per acre in the United States was 26.1, while that in Kansas was 43.5; the average value, \$9.62, that of Kansas, \$10.44. Of the increase in the corn acreage of the State, 1877 over 1876, one-seventh was in the nine counties of the Arkansas Valley, and of the entire corn acreage of the State, one-thirteenth was in the valley. Of the increase of bushels of corn in the State, the valley had nearly one-fourth.

RYE.

The increase of rye product in Kansas, 1876 over 1871, was, as of wheat and corn, the greatest of any State in the Union, and within a million and a



ONE OF THOUSANDS.

half bushels of the entire rye increase in the United States. The increase in Kansas alone was upwards of three times greater than all the other Western States combined, and her aggregate of production in 1876 the largest of all States, as was her average per acre larger than any other State. New York and Pennsylvania each had 65,000 more acres than Kansas, yet Kansas had a million more bushels than either. Kansas had nearly three quarters of a million more bushels than Illinois, the second State in production, and nearly six bushels more to the acre. Kansas had ten bushels to Iowa's one, and more than Ohio, Michigan, Indiana, Wisconsin, Minnesota, Missouri, and Nebraska combined. The average yield of rye in the United States was 13.8, while Kansas had 20.8 bushels to the acre. Of the rye acreage of Kansas in 1877, one-twelfth was in the Arkansas Valley. The average cash value of rye per acre in the United States in 1876 was \$8.94, which was 24 cents more than Ohio, \$3.34 more than Nebraska, \$1.52 more than Iowa, \$2.80 more than Virginia, 28 cents more than Indiana, 25 cents more than Arkansas, \$1.17 more than Kentucky, 90 cents more than Michigan, 66 cents more than Illinois, 72 cents more than Minnesota, 51 cents more than Missouri, etc., etc.

OATS.

The increase of oats in Kansas, 1876 over 1871, was upwards of double that of Indiana, Michigan, Iowa, and Missouri combined, and within less than 200,000 bushels of that of New York, Pennsylvania, and Ohio combined. In 1876, Kansas was the fourth State in the Union in average to the acre, and lier aggregate of production was a million and a half more bushels than

the four States combined having higher acreage. Kansas was ninth in aggregate of production, and had greater average per acre than any of the eight States leading her aggregate bushels. Kansas had 2,500,000 more bushels than all of New England combined, and over one and a half to every one bushel in Illinois. Her average was the highest of any Western or Southern State, - 5 bushels greater than Ohio, 9 greater than Indiana, 5 greater than New Jersey and Delaware, 6 greater than Iowa, Nebraska, and Minnesota, 11 greater than Arkansas, etc., etc. Of the increase of the oat acreage of the State, 1877 over 1876, the Arkansas Valley had one-sixth, and though the State entire showed a decrease, the valley showed an increase. In bushels, the Arkansas Valley showed an increase nine times greater than that of the State as a whole. The average cash value of oats in 1876, in Kansas, was \$6.97, which was \$1.77 more than Illinois, \$1.13 more than Iowa, \$1.72 more than Missouri, \$1.16 more than Nebraska, etc., etc. The average yield of oats to the acre in the United States in 1876 was 24 bushels, while that of Kansas was 31.7.

BARLEY.

The increase of barley in Kansas, 1876 over 1871, was upwards of 1,000,000 bushels in excess of that of the States of Illinois, Ohio, Indiana, Michigan, Wisconsin, Missouri, Nebraska, New York, Pennsylvania, Kentucky, and Maine combined. Kansas, the eighth State in the Union in average per acre, had more than half a million more bushels than the six States having higher average per acre. In production, Kansas was fifth. With the exception of Iowa and Illinois. Kansas had more barley than any of the Western States; upwards of double that of Ohio; more than four times that of Missouri, Nebraska, and Indiana; and more than three times that of Pennsylvania. The average cash value of barley per acre in Kansas in 1876 was \$10.57, or more by \$1.72 than Illinois, \$3.53 more than Nebraska, etc., etc. The average yield of barley per acre in the United States was 21.9, while that of Kansas was 23.5. Of the total acreage of barley in the State in 1877, more than one-seventh was in the Arkansas Valley; and, while the State as a whole showed a decrease of 2.407 acres, the valley showed an increase of 4,933 acres, and in bushels an increase of upwards of half the net increase of the State.

In no one of the three leading grains, as shown by the department Report of 1876, did Kansas show an increase over 1871 of less than 1,750,000 bushels, running from that up to 80,000,000. In the three greatest of all marketable crops, Kansas led every State in the Union.

OTHER GRAINS, ETC.

The official Reports show fully as striking results in other grains, vegetables, etc. In 1876 the average yield of buckwheat per acre in the United States was 14.5 bushels, while that of Kansas was 18; the average value \$10.53, that of Kansas \$14.40. Average yield of tobacco, 700 pounds; Kansas \$14.40.

sas, 700 pounds. Average value, \$52.33; Kansas, \$70. Average yield of potatoes, 71.6; Kansas, 105. Average value, \$48.14; Kansas, \$52.50.

GENERAL SUMMARY.

Of the entire acreage of wheat, corn, oats, barley, rye, and flax in the State in 1877, 4,124,096, 1,669,740 acres were upon the Santa Fé, while of the increase in the State over 1876, of 516,503 acres, 303,345, or upwards of one-half, were upon the Santa Fé. Of the grand total of bushels of the six crops in 1877—158,858,235,—58,465,405 bushels were upon the Santa Fé, while of the increase in the State over 1876, of 43,613,527 bushels, 18,320,057 bushels were upon the Santa Fé. In the light of the foregoing, it would be entirely superfluous to dilate upon the rank of the lands along the Atchison, Topeka & Santa Fé Railroad in Kánsas.

WHAT CAN BE DONE WITH \$1,000.

The questions are often asked, How much money should a settler bring with him to start a farm and make a home in the Arkansas Valley? Or, What is the least amount with which it is safe to arrive in the Arkansas Valley to secure a farm and make a home? For the information of such inquirers, we give a statement of about what could be done with \$1,000. First payment on 160 acres, on the six-years' plan, say \$150; house of two rooms and small kitchen, \$250; team and harness, \$180; breaking-plough, \$22; harrow, \$10; cow, \$30; interest payment on land one year from purchase, \$35; total, \$677; leaving a balance of \$323 for seed and support of family until crop can be raised. Nearly every family coming to Kansas to make a home has more or less furniture, farming implements, etc., which they can rarely sell to advantage. By inquiring of our nearest land agent, they can ascertain cost of chartering a car to destination, or rate per 100 pounds, and if the amount they will sacrifice on the sale of their goods is greater than the cost of transporting it to their new home, then they can readily see it will pay to bring these things along, and will find them very useful if money, with which to lay in a new supply, is scarce.

The cost of starting on a farm in a new country of course depends largely on the size of the family, and the economy, energy, and perseverance of the farmer. A large percentage of our farmers have come to the Arkansas Valley with less than \$1,000, and have done well. Many have come with less than \$500, and made homes and farms. For a man of limited means, it is most advisable to come in the early spring. A week or two will get his house up, and his family settled, and then he is ready for business. No time is wasted in clearing the land of stumps and stones; it lies all ready for the plough, entirely free from both, and the farmer commences at once turning over the sod. In a few weeks enough sod will be broken to enable him to put in a fair crop of barley, rye, or broom-corn (the latter does well on sod), in addition to vegetables, all of which will go far towards supporting, if it does not entirely support, his family during the summer and winter, and

until next crop has matured. The ground broken and planted the first spring will be in good condition when crops are harvested in the fall to seed in winter wheat. In addition to what has been planted, an industrious



THE FIRST CROP.

farmer will break and have prepared enough ground during the summer to enable him to put at least fifty acres in wheat in the fall; and this crop, when harvested in the following June, and marketed, gives him the ready money with which to meet current expenses, make necessary additions to his stock of implements, improvements on his farm, and provide enough for next payment on his land. Within fifteen months from the time of his arrival on his newfarm, the farmer has raised two crops from the same piece of ground. The advantage of the possibility of such a thing to the new settler is so evident that it tells its own story. After harvesting his first crop of wheat, the farmer begins to realize the reward of his toil. Each year adds to the number of acres cultivated, and to the productiveness of the farm, and the occupant is usually able, by the third year, to pay up on his land and take a deed. By this time, by dint of hard work, frugality, and some self-denial the first year, he has made himself a comfortable home, all his own, and nearly all paid for from the products; a farm that, with the rapid growth of the country, will in a few years be valuable, and yet was secured, and a start made on it, including cost of house, stock, implements, etc., with a capital of less than \$1,000.

That the settler can secure so valuable a home with so small a capital is largely owing to the benefits derived from the herd law in the Arkansas Valley. The amount of land the settler newly arrived shall till is not limited to the amount he can fence, but simply to his own ability to turn over the sod. The crops are protected by the aforesaid law, and the farmer breaks every acre he can while the season lasts. Fences are grown with Osage orange in four years that will turn stock, the cost being the man's own labor.

A man with \$1,500 capital can add to the foregoing list a better house, a wagon costing \$75, more farming implements, and have a larger balance left for the support of his family, and emergencies. With a larger capital, a man can do proportionately better. More depends on the industry, economy, and perseverance of the man, and his willingness to endure hardships, if neces-

sary, the first year, than on the amount of capital he brings with him. Success is by no means assured to every farmer. Some fail through their own mismanagement, others from causes over which they have no control; but we think a reference to the statistics in another column will satisfy any practical man that the progress and development made in the Arkansas Valley since opened to settlement is substantial and encouraging; that the general success has rarely, if ever, been equalled in a new country purely agricultural, and where the chances of failure were so limited, if a man goes to work intelligently, farms thoroughly, and is determined to succeed.

TIMBER, FRUIT-TREES, AND HEDGES.

In speaking of the lands lying along the whole line of the Atchison, Topeka & Santa Fé Railroad, the only candid statement that can be made is that native timber is scarce. From Atchison nearly to Newton, timber sufficient for fuel, fencing, etc., can be found along the streams; but the completion of the railroad, and its low rates of transportation on lumber, in connection with the coal found in abundance along its line, as well as the rapid growth of the Osage orange for fencing purposes, almost entirely does



A MENNONITE FARM.

away with this comparative disadvantage of the insufficient supply of timber found in every one of our western prairie States.

In connection with this question of timber, it is important to note how rapidly the want of timber can be met by proper attention. Nearly every variety of tree known to the temperate zone grows readily in Kansas; and the more rapid-growing varieties, like the cotton-wood, maple, peach, and ailantus, with fair care can be made to average over an inch in diameter for each year's growth.

The following trees are indigenous: red-cedar, white, red, black, burr, and water oak, white and red elm, black-walnut and butternut, cotton-wood, box elder, hackberry, honey-locust, willow, shell-bark and pignut hickory, pecannut, sycamore, white ash, soft and sugar maple, red mulberry, linden, coffectree, wild-cherry, Osage orange, crab-apple, wild-plum, and others; of shrubs and vines there are elder, sumac, gooseberry, raspberry, blackberry, hazel, pawpaw, dog-wood, prairie roses, and grapes of several varieties.

Fruit-trees grow with wonderful rapidity and soundness. Nursery-men in the State can furnish forest, fruit, evergreen trees, and hedge plants, at extremely low rates. There is quite a zeal manifested to plant out forest-trees for fuel, wind-breaks, and ornamentation. Peach-trees are grown for shade, shelter, fuel, and fruit. They do remarkably well.

The Osage orange is a particular favorite for a hedge plant.

Under the laws of the State, a man is made secure in his home without the assistance of fences.

A careful consideration of these facts shows that Nature could not have been more wise in her provisions for the welfare of the settler in this section of the country. A magnificent soil, in a gently-rolling valley or upland, is already fully prepared for the plow of the farmer. If he desires a fence, the Osage orange, with little care and trouble, gives it to him; while the railroad transports to his very door coal for fuel and lumber for the building of houses.

LUMBER.

We here give a few of the prices at which lumber is sold on the line of our road:—

Common boards, per M\$25.00	
First and second clear 67.50	
Select clear\$35.00@45.00	Ceiling, § 35.00
Select clear \$35.00@45.00 Stocks 30.00@55.00	Sheathing and culls 20.00
Flooring	Fencing\$22.00@25.00
Siding 20.00@27.50	

A reduction of ten per cent. is made from these rates in car-loads.

AVERAGE YIELD PER ACRE.

The average yield per acre, the past five years, in the Arkansas Valley, of the various products was, of wheat, 19 bushels; of corn, 44 bushels; of barley, 20 bushels; of oats, 32 bushels; of rye, 21 bushels; of buckwheat, 18 bushels; of Irish potatoes, 100 bushels; of sweet potatoes, 180 bushels; of sorghum, 110 gallons; of castor beans, 18 bushels; of cotton, 190 lbs.; of flax, 9 bushels; of tobacco, 800 lbs.; of broom-corn, 910 lbs.; of millet and Hungarian, $2\frac{1}{2}$ tons; and of timothy, $1\frac{1}{4}$ tons.

FRUIT-GROWING.

The vicissitudes of climate which make fruit-growing so precarious in nearly all parts of the West do not apply to the Atchison, Topeka & Santa Fé Railroad lands. The peculiarities of soil and climate stamp this region with the characteristics of an excellent country for the raising of fruit; and, indeed, a number of fine orchards along the line sufficiently exemplify this, while along what is called the "Sand Hills," near the Arkansas Valley, the wild-plums, grapes, etc., which there grow in greatest profusion, show what is possible with cultivation.

In parts of this country which were settled several years since, many

establishments are found where the cultivation of small fruit is made a specialty, and the crops of grapes, strawberries, blackberries, and raspberries are generally enormous.

Colored sectional maps, showing lands sold and unsold, will be mailed to any address on receipt of fifty cents.

CORN.

That the Arkansas Valley is not only the great wheat belt of Kansas, but rapidly acquiring the right and title to a similar proud distinction as regards corn, would appear from the records; for certainly the official Reports of the State Board of Agriculture contain no more suggestive pages than those devoted in part to the facts of corn acreage and yield in the Arkansas Valley. In 1872, the entire acreage of corn in the valley was but 6,272; and some conception may be formed of the substantial progress from that year to this, from the supplementary Report of Secretary Gray, of the State Board of Agriculture, showing an acreage of corn in the Arkansas Valley, for 1877, of 192,563 acres. In 1872, the total bushels for the valley were 250,880; in 1877, the total bushels were 9,824,950.

PRICE AND LOCATION OF THE LANDS.

Prices vary according to soil, location, water-supply, timber, proximity to railroad stations, and other advantages, in precisely the same manner that other lands do.

All these peculiarities of every lot offered for sale may be learned at the office of the Land Commissioner, or of any of the local agents along the line; but every man will, of course, examine in person the land he expects to cultivate, and the locality where his home is to be, and for this every facility is offered.

It is quite impracticable to prepare and send out lists of prices, but the following will show the *general range of prices* in each county:—

Counties.	Acres.	Price per acre.
Osage	654.06	\$4.50 to \$6.50
Lyon	251.11	4.50 to 6.50
Wabaunsee	11,848.94	3.50 to 5.50
Greenwood	21,640.00	4.00 to 5.00
Morris	27,389.13	2.50 to 6.50
Chase	124,883.97	2.50 to 9.00
Marion	100,363.23	4.00 to 9.00
Butler	40,226.13	5.00 to 9.00
Harvey	54,906.38	5.00 to 10.00
Sedgwick	47,435.45	3.00 to 10.00
McPherson	35,066.34	3.50 to 7.50
Reno	239,036.96	1.50 to 9.00
Rice	129,956.37	4.00 to 8.50
Barton	245,677.28	1.50 to 9.00
Rush	59,263.67	2.75 to 8.50
Pawnee	161,253.07	1.50 to 9.00
Edwards	120,645.46	1.50 to 9.00
Ford	112,502.07	4.00 to 8.00
Pratt	18,599.38	2.00 to 4.00
Hodgeman	80,489.79	4.00 to 8.00

THE POTTAWATOMIE RESERVE.

The Pottawatomie Reserve is located in the eastern part of Kansas, and in the centre of the oldest settled part of the State; is thirty miles square, lying westerly and north-westerly from Topeka, the south-east corner lying three miles west and four miles south of this city. Those portions of the reserve belonging to the Atchison, Topeka & Santa Fé Railroad Company lie in the north-western part of Shawnee County, in the north-eastern part of Wabaunsee, in the south-eastern part of Pottawatomie, and in the south-western corner of Jackson County. The Kansas Pacific Railway runs through the centre of the reserve, and the Kansas River, affording excellent water power, also runs through the reserve. The Atchison, Topeka & Santa Fé Railroad Company have about one hundred thousand acres of the reserve yet unsold. There are no richer bottom-lands anywhere than those of the Kansas River.



CORN BOTTOMS.

They are universally of a deep, rich, alluvial loam, and all tillable; but some are smoother than others, and very rarely a small tract is found that is inclined to be a little too wet; so that their difference of value generally depends upon their distance from a town and railroad station, and upon the convenience of water for stock, and the amount of timber upon them.

The prices are, for the best bottom-lands, from two to eight miles from the depot, from \$10 to \$14 per acre; and for the same with water and timber, or either, \$11.75 to \$15.75. A few pieces near or adjoining town run from \$16 to \$18.

Settlers on these lands not only have the advantages of the wealth of rich soil, healthy air, pure water, and lasting fuel, that Nature has lavished upon the reserve, but they have also the advantages of the railroads, the schools, the churches, and the society, that have been brought into and about the reserve by the enterprise and energies of the people who have been for twenty years settling and accumulating around it. They are within easy reach of old and well-established churches and society, and almost within sight of the largest and most flourishing colleges and seminaries in the "rising State of the West." They are at or within an hour's drive of a station on one of the great railroads of the country, and within one to five hours' drive of the depot of another as great, and within one to five hours'

drive of the centre of railroad competition to all points East and West. Thus, while the settler on the reserve is emphatically in a *new country*, he is decidedly within the fully developed civilization of an old country.

The price per acre, where one-half or three-fourths to seven-eighths is good land and tillable, is from \$2.50 to \$5.25, average about \$4; where one-fourth to one-half is good and tillable, from \$2.25 to \$4.75, average \$3.50; where not to exceed one-fourth is good and tillable, from \$1.50 to \$2.75, average \$2.25; to be taken by the 40, 80, or 160 acre tract, according to the way in which it has been appraised.

The terms of payment are: One-fifth cash at time of purchase, with interest on deferred payments for one year. One year thereafter, only the interest to be paid on the deferred payments. The third year and each year thereafter, until the entire amount is paid, one-fifth of the purchase money, with interest on the remaining deferred payments.

The office of this department is with that of the Land Department of the Atchison, Topeka & Santa Fé Railroad Company, on the corner of Sixth and Kansas Avenues, Topeka, Kansas.

All communications to this department should be addressed to W. G. Dickinson, Commissioner, Topeka, Kansas.

DAIRYING.

Every indication goes to show that there is less danger of dairying being overdone than almost any other branch of farming. One thing is certain, that the increasing population will increase the demand. Also, that the prices for prime grades of butter and cheese are steadily advancing. Thirty years ago the price of first-rate dairy butter in New York city was sixteen cents a pound, and the price of cheese was from seven to eight cents a pound; whereas the average price for all grades of both Eastern and Western butter during the past year was thirty cents a pound; and for cheese eleven and three-quarters cents. Another point must be considered: the products of our American dairies are eagerly sought for, and find a ready sale, at high figures, in foreign markets. It is estimated that it requires several million pounds of butter to supply our home demand, and that the call for better grades exceeds the supply. If New York dairy-men can make a profit at the business, and yet pay freightage to our Western cities, and the usual commissions, why can we not successfully compete with them?

The cheese and butter factories which have already been established in Kansas have invariably proved profitable, and others are continually being established. We have yet to hear of a butter or cheese factory, which has been managed by a skilful superintendent, that has not made money. These are the kind of factories that farmers can profitably take an active part in conducting. Food being the productive result, such factories are in the direct line of their calling. One marked feature in dairying as a business is the uniformity of results. It is slow, but sure, business. Many are too impatient of results. They do not possess that spirit of careful and

intelligent investigation which is essential. Others, again, have no taste for the business, and would not succeed at it. One of the strong points in the business is the ever increasing fertility of dairy farms. Grain-producing on



A DAIRY FARM.

our upland clays, as it is usually carried on, is calculated to impoverish the land. It is not so with the business under consideration. The more we increase the size of our dairies, the more thoroughly we enrich our lands. A good dairy will measurably obviate the use of commercial fertilizers; for in stabling and bedding with a liberal supply of straw, each cow will, if well fed on the best food for producing milk, necessarily furnish a large amount of rich manure.

If we carefully compare dairying with other branches of farming, we will be surprised when we ascertain what a profit each cow pays upon her market value. A single statement will serve as an illustration: The eighteen thousand cows in Trumbull County, Ohio, furnish milk for cheese factories averaging during the factory season three thousand five hundred pounds of milk to each cow. Ten pounds of milk to one pound of cheese gives three hundred and fifty pounds of cheese, which, at ten cents a pound, is \$35; thirty-three and one-third pounds of butter made before and after the factory season, at twenty-five, is \$8.33; making the gross income for each cow \$43.33.

Still another advantage in dairying is that the income is constant as well as certain. Probably the greatest disadvantage Western dairy-men labor under, as compared with Eastern ones, is the fact that in most portions of the West we lack fine springs and clear, running water. But this is not the case in our section of the State. We have an abundance of clear, pure water in all portions of our county. Wells are easily and cheaply dug or bored, and with a wind-pump, pure water can be cheaply and abundantly furnished to the stock. Cows must not be compelled to drink out of stagnant ponds or pools. In fact, they should not be allowed to drink water that is not pure enough for the use of the human family.

In such a country, with ranges for stock unrestricted and pasturage limitless, the production of butter and cheese must be profitable. Butter is worth, the year round, from twelve to forty cents per pound. Regular manufactories for cneese are being established with success. As yet, in this line, comparatively little has been done. The abundance of pure cold water, the frequency of springs, the facilities for cool cellars, which everywhere exist, and the cheapness with which cattle can be raised and fed, leave this branch of labor without any drawbacks, and insure handsome, returns and liberal profits to all who may engage in the dairying business.

The cost of a first-class dairying establishment, for a capacity of one hundred cows, is \$1,000; for a capacity of three hundred cows, \$2,800.

No grass will produce more milk, butter, or beef than prairie grass.

The calves may be raised more profitably here, where feed and grass are so cheap and easy of access.

That the Cottonwood Valley country is to become the favored dairying district of the West, we have no doubt. A brief comparison will show at a glance its advantages:—

If in New York, where land is worth from \$60 to \$200 per acre, cows from \$70 to \$90 each, corn \$1 per bushel, hay \$30 a ton, with long winters to feed through, cheese can be manufactured, shipped to Kansas, and beyond, and made a profitable business, then, certainly, the question becomes a pertinent one, Why should not this district—with a rich soil, a temperate climate, abundance of excellent springs, and clear, running streams of water, where land can be bought from \$2 to \$8 per acre, cows from \$25 to \$35 each, prairie hay can be had for only the cost of cutting it, and native grasses succeed admirably—offer the most tempting inducements to engage in the business?

WHAT IT COSTS TO LIVE.

That there may be no exaggeration of the cost of living in the Arkansas Valley, but, on the contrary, a fair understanding had of the ruling rates on every-day commodities, we give quotations of the prices obtained from the leading retail houses in Newton, Harvey County; Hutchinson, Reno County; Sterling, Rice County; Great Bend, Barton County; Larned, Pawnee County, and Kinsley, Edwards County. Wichita, Sedgwick County, is the great wholesale centre of the South-west; but it is the intention here to give retail rather than wholesale prices, as the farmer desires only to know what he will have to pay for the goods. No. 1 coffee runs from 3 to 4 lbs. for \$1; sugar, from 5 to 8½ lbs. for \$1; flour, from \$2.50 to \$4 per 100 lbs. Canned fruits, vegetables, etc.: 2-lb. cans, 20 cts.; 3-lb. cans, 30 cts.; 4-lb. cans, 40 cts. Salt, \$3 per bbl. Calicoes range from 8 to 16 yards for \$1; cotton, 8 to 12 cts.; "Indian Head," and other well-known brands of muslins, 10 to 12½ cts. Boots, shoes, clothing, hats and caps, and such sort of things, run about the same as in the East. One can get a good cook-stove, with accompanying utensils, for \$20, and all classes of hardware in equally reasonable proportion. Farm-wagons of standard make sell for \$70 to \$80; cultivators, \$22; sulky-plows, \$60; reapers and mowers, \$160; harvesters, \$175; cornplanters, \$50; drills, \$60; breaking-plows, \$22; corn-shellers, \$15, etc., etc.

LIVE STOCK.

South-western Kansas is preëminently the stock-raising district of the West. The prairies, almost boundless in extent, are fairly bedded with the most nutritious grasses; and the extent of the range on either side of the Atchison, Topeka & Santa Fé Railroad is practically unlimited. Woolgrowing in the Arkansas Valley is rapidly assuming vast proportions; and those interested in sheep should at once write to A. S. Johnson, Topeka, Kansas, for a neat little publication just issued, and specially devoted to wool-growing in south-western Kansas. It is sent free, postage prepaid, to all requesting it. Cattle-raising has for years been a leading feature of the Arkansas Valley, and of late the increase in hogs has been something simply enormous. The mild winters, peculiarly rich grasses, cheap feed, and unrivalled range in south-western Kansas, offer inducements to those interested in live-stock far surpassing any other section in all the West.

MARKETS.

There are no better grain-markets in all the West than at Kansas City and Atchison, and both these centres are on the Atchison, Topeka & Santa Fé Road.

The objection of former days, if ever valid, is so no longer. The fact is that farmers in Kansas have a market on the West, as well as on the East. The vast mining-regions just beyond make a constant and increasing demand for cereals and dairy production. The *net profit* on the investments of our farmers is from twenty to thirty per cent. more than the Eastern farmers can get from theirs. The railroad facilities to the East are superior, competing lines affording the very lowest prices.

OUR POLICY TOWARDS PURCHASERS.

The grant of lands to the Atchison, Topeka & Santa Fé Railroad Company was given to assist the construction of the road through an entirely new and unimproved country, where it had to be built, and operated for many years at a loss, before sufficient immigration could be attracted to make a profitable business. The company is aware that the surest foundation for its own prosperity is a productive region, thickly settled by a prosperous and successful farming community: that its interests are identical with the interests of the people by whom it is to be sustained. It is, therefore, ready and desirous to give every advantage in its power to the purchasers of its lands which will insure them success. Experience has shown that it is very difficult for a farmer to succeed, if his first efforts towards the improvement and cultivation of his farm are crippled by the want of means, and, as per terms offered, it waits for the pay for its land until the purchaser has brought it into a good paying condition, and has secured a comfortable home for his family and himself.

It has been demonstrated in hundreds of cases, on the lands comprising their grant, that a man with a little means to make a start with can improve his farm and bring it to the highest state of cultivation; can build him a good house, and surround himself with the comforts of life, and pay for all



TWO YEARS' DEVELOPMENT.

these, and the cost of his land besides, out of its products, by the time the whole of the principal is payable. And in order to give the man of small means, who could not hope to do this elsewhere, the opportunity to accomplish it here, this company inaugurated the system of Low prices, Low interest, and long credit for its lands. The lands can be bought from one and a half to eight dollars an acre. In order that the purchaser may use his money on the land, a credit of eleven years is given at a rate of interest lower than is demanded in any of the Western States.

By availing themselves of these generous advantages, which this company was the first to offer, hundreds who might have earned only a bare living from day to day, or who would have passed their lives as tenants on the farms of others, have secured for themselves farms and homes of their own, and are to-day prosperous and thriving men.

SCHEDULE OF TERMS.

Terms: No. 1 is on eleven years' credit with seven per cent. interest. The first payment at date of purchase is one-tenth of the principal and seven per cent. interest on the remainder. At the end of the first and second year only the interest at seven per cent. is paid; and the third year and each year thereafter one-tenth of the principal, with seven per cent. interest on the balance, is paid annually until the whole is paid.

EXAMPLE.

On one hundred and sixty acres at \$5 an acre, bought Jan. 1, 1876, the payments would be as follows:—

Date of Payments.	Principal.	Interest.	Total.
Jan. 1, 1876, (date of purchase)		\$50.40 50.40	\$130.40 50.40
" 1878		50.40	50.40
" 1879 " 1880	80.00 80.00	44.80 39.20	124.80 119.20
" 1881 " 1882	80,00 80,00	- 33.60 28.00	113.60 108.00
" 1883	80.00	22.40	102.40
" 1884 " 1885	80.00 80.00	16.80 11.20	96.80 91.20
" 1886	80.00	5.60	85.60
" 1887 Total of payments at end of 11 years	80.00	8352.80	80.00

Terms: No.2. Eleven years with seven per cent. interest. No part of the principal due for four years. During the first four years only the interest is required, and in the last eight years one-eighth of the principal, with seven per cent. interest on the balance, is paid annually.

EXAMPLE.

On one hundred and sixty acres at \$5 an acre, bought Jan. 1, 1876, the payments would be as follows:—

	Date of Payments.	Princi	pal.	Interest.	Total.
Jan.	1, 1876 (date of purchase)			\$56,00	. \$56,00
4.6	1877			56.00	56,00
6.6	1878			56.00	56 00
6.6	1879			56,00	56.00
66	1880			49.00	149.00
4.4	1881		0.00	42.00	142.00
6.6	1882	100	0.00	35.00	135.00
66	1883		0.00	28.00	128.00
66	1884		0.00	21.00	121.00
66	1885		0.00	14.00	114.00
4.6	1886		0.00	7.00	107.00
6.6	1887		0.00		100.00
Total	of payments at end of 11 years	\$800	0.00	\$420.00	\$1,220.00

The terms of Sale No. 2, where only the interest is paid for the first four years, are applicable only to lands lying west of the west line of Reno County, on the south side of the Arkansas River, and west of range 18 west, on the north side of the Arkansas River. East of these lines the land can be sold only on our Terms No. 1, No. 3, and No. 4.

TWO 'YEARS' CREDIT.

Terms: No. 3. Three payments. In consideration of the purchaser's paying one-third of the principal at time of purchase, with ten per cent. interest on the remainder, and the balance in two annual payments, we make a discount from the appraised price of twenty per cent., and the payments will come as follows:—

EXAMPLE.

One hundred and sixty acres at \$5 an acre, bought Jan. 1, 1876, would amount to \$800. Twenty per cent. off would reduce it to \$640, and the payments would be as follows:—

Date of Payments.	Principal.	Interest.	Total.
Jan. 1, 1876 (date of purchase)	213.33	\$42.66 21.33	\$256.00 234.66 213.33
Total of payments at end of 3 years	\$640.00	\$63.99	\$703.99

CASH PURCHASE.

Terms: No. 4. This is a sale where the whole amount of purchase-money is paid down and deed given. For each we make a discount of twenty per cent. from the appraised price.

EXAMPLE.

Jan. 1, 1876, 160 acres at \$5 per acre	
Total amount of payment	\$640.00

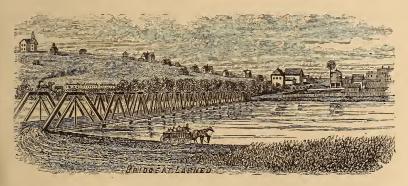
PAYING UP IN FULL ON LONG CREDIT PURCHASE.

All persons who buy on long credit are allowed to pay up at any time they desire to do so, and obtain a deed to their land; and they will receive a liberal discount for payments made some time in advance of maturity.

HOW TO SELECT LANDS.

The only satisfactory course for purchasers is to see the country and make their own selections. All the company's land has been carefully examined; and in the general office of the Land Department at Topeka, Kansas, can be found plats and descriptions of every lot, which are freely open to the inspection of all inquirers; and experienced men, who are personally familiar with the lands, will give any information desired.

The company have a local agent at each of the stations along the road.



These agents are reliable men, are furnished with plats and prices of all the lands in their vicinity, and they will cheerfully afford you every facility for examining and selecting the lands for sale.

You can, at their offices, make application for the land you select, paying the first payment on the same, and receive credit for your Land Exploring Ticket, should you have one. All subsequent payments are made to the General Land Office at Topeka; and the system of payments which has been established will render the duties of every one who purchases land perfectly easy and eminently satisfactory to him.

The lands of the company are so vast in extent and so varied in character, that the wishes of almost every one can be met, if the intended purchaser will make them known.

In another part of this circular we give a list of our local agents at the several stations, and also a list of our agents in other places.

SUGGESTIONS TO LAND BUYERS.

Before coming to purchase lands, see to it that you have the necessary means, and make careful consideration as to their expenditure.

COUNT THE COST.

None should come without proper forethought and needful capital, but with these the way is open and the prospect bright.

It is difficult to make progress anywhere without capital, and nowhere is the need of money more keenly felt than in a new settlement.

You will require money for the expenses of transportation for yourself and family, and such household goods and stock as you may determine to



bring; for the first small payment on the land purchased; for buildings and other improvements; for farming-tools, and provisions, until you can raise and grow and sell a crop.

THINGS TO LEAVE.

It is not advisable to transport heavy or bulky material any great distance. Agricultural implements adapted to the soil of the region, and household goods in all their variety, can be purchased here as cheaply as in the Eastern or Middle States, after adding the cost of transportation. Cattle and horses should not be brought, unless of some superior class, as ordinary breeds can be purchased for much less than they could be landed here.

HALF-FARE TO FAMILIES OF PURCHASERS.

Purchasers of our land, moving to their lands with their families, can obtain tickets for themselves and the members of their families at our offices in Atchison or Kansas City for one-half the regular rate, upon presenting their contract for land bought of the company, or a receipt for the first payment.

Tickets will be sold under this arrangement to all points between Cottonwood and Kinsley on the main line of the road. Parties moving into counties on the Wichita Branch can buy these tickets to Newton, and pay local fare from Newton to destination.

Land-seekers will notice how much better this arrangement is than that of paying the whole amount for the tickets, and then having to go through the tedious and annoying process of getting a portion of the money back again.

EXPLORING TICKETS.

Land Explorers' Tickets can be purchased at the company's offices in Atchison and Kansas City, and of our principal State and County agents, a list of which will be found in another part of this book.



A certificate will be given to each purchaser of a Land Explorers' Ticket, containing the following agreement:—

In consideration that the party to whom this Certificate is issued shall, within sixty days from the date of this Certificate, purchase one hundred and sixty acres of the lands of the railroad company, on the terms proposed in either of its terms of sale, numbered 1, 3, or 4, and surrender this Certificate, the said railroad company will allow such person on the first payment on such contract the sum of (being the sum stated in the Certificate), or one-half of said amount in case eighty acres are purchased; or one-fourth of said amount in case forty acres are purchased; and if the purchaser prefers to make his purchase under the terms numbered 2, one-half of the above amount will be allowed. But one rebate will be allowed on any one purchase of land.

These exploring tickets permit the purchaser to stop off at the different stations going and returning, to examine lands and see the country.

TITLE TO LANDS.

The land comes to us by patents from the United States and the State of Kansas, and when full payment is made we give Warranty Deed to the purchaser.

WHAT HAS BEEN DONE.

OTHERS CAN DO THE SAME.

Mr. Lyman Cone, of Burrton, in Harvey County, purchased of the rail-road company the south-west quarter of section 21, T.23, R.3 west, cornering with the town of Burrton, in 1874, at \$10 an acre, on eleven years' time. He had forty acres broken, and in the fall of 1874 sowed it to winter wheat. Below we let him tell his own story of the result:—

· ·				
Breaking 40 acres	@ \$3.00	per	acre,	\$120.00
Stirring 40 acres	a 1.50			60.00
Harrowing 40 acres	ã .60	66	66	24.00
Seed, 60 bushels	æ 1.00	"	bu.,	60.00
Sowing	_			5.00
Harvesting and stacking	$a_{0} = 2.00$	66	acre,	
Threshing				54.00
Value of land, 40 acres	@ 10.00	- 66	66	400.00
	_			
				\$803.00
1,080 bushels wheat sold	@ 1.15	46	bu.,	1242.00
				\$439.00

Leaving a net profit, after paying for the land at the high price of \$10 an acre (it being valuable land immediately joining the town site), of nearly \$10 an acre. This result was obtained by a man who was engaged in business in the town, is not a farmer by profession, and hired all the work done.

STATEMENT OF JERIEL WILDAY,

of Augusta, Butler County. Drilled in the Gold Drop, a variety of winter wheat resembling May wheat, on bottom-land, in the forks of Walnut and Whitewater Creeks. Harvested over SIXTY-THREE bushels to the acre. The ground had been in cultivation five years, and had been planted in wheat for several previous seasons. Ploughed six to seven inches deep, and used one and one-half bushels of seed per acre.

Henry Stull, near Augusta, had, on a field of twenty-six acres, forty-five bushels per acre.

Wm. Mellison, of Marion Centre, Marion County, raised over SIXTY bushels of wheat per acre. It stood over five feet high.

STATEMENT OF C. KIRLIN,

of Newton, Harvey County. In the latter part of September, 1874, I sowed broadcast and harrowed in the variety of wheat known as "Red Genesee." I also sowed in corn stubble, and ploughed in with a cultivator some of the same variety, in all about fifty acres. I harvested in the latter part of June, and obtained thirty bushels per acre. This wheat weighed sixty-four pounds to the bushel. The soil is a black, sandy loam, second bottom prairie, and has been in cultivation two years, the first crop being sod corn.

The cost of producing was as follows: -

Seed, per acre		04.05
Seed, per acre		 \$1.25
Planting, per acre		 1.50
Planting, per acre Harvesting and stacking, per a	cre	 2.00
Threshing, per acre		 3.00

Total cost, per acre		 \$7.75

STATEMENT OF COL. R. C. BATES,

of Marion Centre, Marion County. I raised five varieties of wheat the past season. The best yield was the Lancaster, forty-five bushels per acre. I had twelve acres of Gipsey wheat; which averaged thirty-seven bushels per acre. This latter variety is a bearded white chaff. I drilled it on black-loam bottom-land, which had been in cultivation five to six years. I plant corn and small grain alternately. I drilled this wheat in on the 15th day of September, and harvested the crop on the 20th day of June. The total cost per acre was as follows:—

oughing	,
eed	
rilling	
hreshing	,
Total cost per acre	

I regard this as a superior variety of wheat for this soil and climate, and I prefer drilling in grain to broadcast sowing. I gave it a fair trial last



year. My neighbor sowed the same seed on the same soil and harvested twenty-five bushels per acre, while I harvested thirty-seven bushels.

STATEMENT OF ED. R. BONNELL,

of Larned, Pawnee County (county new). Thus far we have only had sod crops. Acreage of fall wheat small; seven hundred and forty-eight acres, which yielded from fifteen to twenty bushels per acre. Barley, drilled on sod broken last fall (1874), averaged twenty bushels per acre, of good quality. Spring wheat, drilled on sod, averaged twelve bushels per acre, quality good. I broke sod during the month of March and first days of April, which I harrowed twice over, and drilled to oats on the 12th day of April, which yielded twenty-two bushels per acre, extra quality. The kind of oats was of the barley variety. Sod corn yielded an average of twenty bushels per acre, quality good. The acreage of fall wheat sown this fall is at least four hundred per cent. above that of last year, which looks exceedingly well. Soil, a black, sandy loam, matted with buffalo grass.

STATEMENT OF HON. JOSEPH ROSS,

of Newton, Harvey County, formerly of Pittsburgh, Pa. Purchased of the Atchison, Topeka & Santa Fé Railroad Company section 27, T.23, R.1 west;

640 acres, at \$7.75 per acre, on eleven years' time. In 1874 had fifty acres broken and sown to wheat, with the following result:—

Breaking		. ത	\$3.00	ber	acre.	\$150.00	
Stirring		· @	. 1.50	- 66	66	75,00	
Harrowing .		· @	.25	"	"	12.50	
Seed, 75 bus	shels	. @	1.25			el, 93.75	
Drilling		. @	.25			12.50	
Harvesting	and stacking	. @	2.00			100.00	
Threshing 1	,250 bushels	. @	.05	66	bush	el, 62.50	
Cost of land	l, 50 acres	. @	7.75	"	acre,	\$506.25 387.50	
1,250 bushel	s wheat	. @	1.15	per		\$893.75 1,437.50	
Net profit						\$ 543.75	

The following is a copy of a letter received by Col. Johnson, Land Commissioner of the Atchison, Topeka & Santa Fé Railroad, from a settler, and published in the Boston *Journal*. It was not intended for publication, but we publish it as a matter of general interest.

NEWTON, Kansas, May 13, 1878.

Col. Johnson:

Dear Sir,—Inclosed you will find my contracts. Also money to make the payment due the 25th inst.; and I would further say that I am still occupying my land, myself and family, and don't wish to sell out. Also that we are still improving our place as fast as our means will permit, but not running in debt. We have about seventy acres of very fair wheat, and about the same of oats, and one hundred and twelve acres of very nice young corn, and expect to sow fifteen acres of millet this week.

We have our hedge all cultivated nicely, and it is in a good growing condition. Will finish cultivating once over this spring; my fruit and forest-trees this week. My trees have done well, both fruit and forest. We have about twenty-five hundred peach-trees, and there are not less than five hundred bearing fruit. I have one hundred and fifty apple-trees; some of

them bloomed this spring, but none bearing.

I have near twenty thousand forest-trees growing, consisting of cottonwood, boralder, walnut, ash, white willow, and a few Lombardy poplars. I have cotton-wood trees, three years' growth, that measure sixteen inches in circumference; and I have one thousand peach-trees in one orchard, three years' growth, that will average nine inches in circumference, and many of them in full bearing.

I also have grapes, plums, apricots, and a good lot of small fruits in bearing, and should have said cherries also in bearing. My oldest peach-trees are quite large, and they bore a fine crop of fruit last season, and are very full now. I have sold from my farm the past three years about eight carloads of grain and hogs (mostly grain). I also have my farm very well stocked with horses, cattle, and hogs, and plenty of good feed for them.

Col. Johnson, I make these statements to you, not to be blowing, or anything of the kind; but I considered the company had a right to know what I am doing in the way of improvements, as they have given me deductions for improvements, and I have made no statements but what are correct, and such as I can establish beyond a doubt. Any time the company may see fit to send emigrants to my farm, I will take pleasure in showing something of the productions of our soils; and I feel fully capable of convincing any reasonable mind that we have a country that's good for something.

Please make the credits on my contracts, and return by mail.

Thanking the company for past favors, I remain,

Yours respectfully,

A. H. McLAIN.

THE QUESTION OF RAIN.

The Agricultural Department furnishes the following statement of the average fall of rain in the several States below named, in the months of May, June, July, and August, for a period of ten years, which shows favorably for the new West:—

Inches.	Inches.
Kansas	Indiana
New Jersey	Missouri
Iowa17.05	New York
	Nebraska14.96
	Vermont14.69
Pennsylvania	Illinois14.68
	Rhode Island14.45
	New Hampshire14.27
	Wisconsin
	Michigan14.01
Ohio	

RAINFALL IN DIFFERENT COUNTRIES.

COMPILED FROM REPORT OF STATE BOARD OF AGRICULTURE OF KANSAS FOR 1874.

Localities.	Spring.	Summer.
Localities.		Inches.
Manhattan, Kansas	6.83	13.28
Rochester, New York.	8.82	9.51
Boston, Massachusetts		9.81
Providence, Rhode Island		10.54
Urbana, Ohio	11.03	11.13
London, England		6.00
Marseilles, France		2.17
Berlin, Prussia		7.21
Simferopol, Crimea		6.01
Longan, South Russia	3.57	4.99
St. Petersburg, "	2.89	6.73

It will be observed from the foregoing statement that the great wheatproducing regions of southern Russia have a much smaller rainfall than Kansas.

There are periods of drought everywhere. Kansas is no exception. But these periods can always be provided for by the prudent farmer, and never ought to cause want, complaint, or even ten words of talk. The rule is, abundant and overflowing harvests, and these are so generous that the old settler ought to be free from debt, have his granaries full, and have a handsome bank-account. There are hundreds and hundreds of cases where men have paid for their land by the first year's crop; but there is no case on record where a fool became a wise man by going to Kansas, or where these fertile prairies fed a man who was too lazy to save enough corn, hogs, chickens, fruit, and wheat, in six years to feed and clothe him through the seventh.

But each man has to go through the world in his own way, and experience his own experience. When the poet Goethe was a lad, he asked his teacher what experience was. To the same question, oft repeated, the grave tutor could give the youth only one answer: "Experience is the experience that the experienced man experiences in experiencing his experience." It could not be told to the inexperienced.

FARMING BY CONTRACT.

The following letter from a business man in Kansas will explain itself:—

As you are aware, I do not reside on my farm, neither do I claim to be a farmer in the ordinary sense of the word. I make wheat-raising a specialty on my farm. Every operation connected therewith, from the time the prairie is first broken until the grain is marketed, is done wholly by contract, those employed furnishing themselves in every particular.

The method of operation is as follows: The prairie is broken during the months of May and June, but may be prolonged till the middle of July. By the 20th of August the sod is once thoroughly harrowed over, it being wholly unnecessary to replough the ground. Then seed, at the rate of one bushel to the acre, is scattered broadcast, and the seeding is completed by two more harrowings, making a total cost, so far, including the seed, of \$5 per acre. By the 20th of June following, the grain is ready for harvesting, which can be hired done with headers at the rate of \$2 per acre, including stacking. Threshing costs eight cents per bushel, and the cost of marketing depends of course upon the distance hauled. If the grain yields twenty bushels to the acre, which is a low average, and the distance from town is not more than three miles, the total cost—\$4 more being added to the cost of seeding - aggregates \$9 per acre. The wheat averages rather above \$1 per bushel, so that the clear profit of \$11 per acre remains, and everything hired done.

The straw, to a farmer, is worth \$2 per acre for stock-feed.

A second crop can be grown at an outlay of not more than fifty cents per acre, aside from seed, and the mere cost of drilling the grain into the ground, without the necessity of reploughing,—taking the precaution to clear the land of all litter, by burning off its stubble. The ground is so fertile that even three crops of wheat may be grown in succession on one plowing, and that the first one. Two years ago, I put in 500 acres, pursuing the foregoing method. My yield was 19 bushels to the acre, and it sold at 90 cents per bushel, wheat in 1874 having brought a lower price than was ever known here before; it afterwards, during the following winter, advanced to \$1.15 per bushel. I have just finished threshing 26,800 bushels, as the yield of 1,200 acres, an entire average of 22½ bushels to the acre, which I have sold at \$1.05\frac{1}{2} per bushel, making a total net profit of \$18,974. My straw is worth fully \$1,500 more, and the land is increased at least \$5 per acre from being placed under cultivation. By this you will see the results of my own experience are decidedly satisfactory, and as to the others around, as I wrote you some weeks ago, I have never seen things look more hopeful than now. The acreage of winter wheat is nearly double that of any previous year, and twenty-five per cent. better, and the same may be said of nearly all other crops; the result of all of which is, that a general spirit of satisfaction and contentment prevails, and many a home will have cause to bless the grasshopper year, for having instilled a lesson of economy and determined industry. Respectfully,

COMPLIMENTS FROM NEIGHBORS

ON THE ARKANSAS VALLEY.

States are apt to be jealous of each other. They are, in a certain sense, rivals of each other. The following testimony, therefore, however flattering it may be, is that which simple justice requires. The evidence, of which only a small part that might be cited is here given, is taken from the *editorial* remarks found in the papers quoted. In June, 1875, a party of more than two hundred editors made an excursion over the Atchison, Topeka & Santa Fé Railroad, and here we present some of the comments of some of that party:—

For three hundred and fifty-two miles along the great Valley of the Arkansas, no better nor more productive soil exists on this broad continent of ours; grains, vegetables, and fruits of all kinds grow luxuriantly. The question has been asked me with regard to fruit, etc. I have only to say that where the country has been settled, fruits of all kinds, such as apples, pears, peaches, grapes, and small fruits, grow in abundance.—De Witt (Ia.) Observer.

While we would not advise our citizens who have good homes to abandon them, yet we must acknowledge that the Arkansas Valley presents superior advantages to farmers of small means.—Princeton (Mo.) Advance.

From Emporia on, the railroad passes through a delightful country for fifty miles. This is the Cottonwood Valley, so famous for its fertility. The corn, nine feet tall, and the bright, yellow wheat, already filled out, attest to the justice of this reputation; and the splendid-looking cattle that feed upon the long grass here would further indorse it, if they could tell their judgment of the fare that is set before them.— Cleveland (Ohio) Herald.

No more beautiful or fertile country is to be found than the Cottonwood and Arkansas Valleys. And remembering that the entire country through which we passed was utterly destroyed last year by the grasshoppers, the crops in view were an astonishment, and the recuperation of the land a marvel. No part of the Shenandoah Valley, in its palmiest days, ever displayed such a production of cereals; and the sight of wheat and barley already in the shock, thousands of acres ready for the harvesters, and the advanced stage of corn, oats, etc., drew from the beholders involuntary exclamations of admiration and wonder.—Martinsburg (W. Va.) Independent.

For forty-five miles after leaving Emporia, the road runs up the valley of the Cottonwood, a section of remarkable fertility, and now covered with the finest of crops. We were shown well-ripened and matured rye seven feet high, and wheat over six feet. Samples of timothy and millet upwards of four feet high were brought to the cars, and corn nine feet six inches, and in tassel, the latter said to be an average of an eighty-acre field, from which it was taken. . . . In this valley and on to Wichita the crops surpassed anything I have ever seen.—Huntington (Ind.) Herald.

The lands along the valley of the Arkansas River are splendid for farming, and from the enormous crops raised there it is claimed to be the most productive part of Kansas. From thirty to fifty bushels of corn to the acre, on newly-broken ground, is the average. Oats from twenty to fifty bushels.

Vines of all kinds, potatoes, beets, peas, lettuce, and every kind of plants, give enormous returns. Osage orange seed sown for hedges on the sod produce plants from three to five feet high. West of Dodge City is one of the finest grazing countries in the world. Thousands and thousands of cattle are supported there. We saw one herd which contained at least five thousand head. The climate of Kansas is especially fine, sickness being rare. Taken all in all, Kansas is one of the best States in the Union, and we advise every young man seeking a home to take the advice of Horace Greeley, and go to the Valley of the Arkansas, and grow up with the country.— Quincy (Ill.) Herald.

We can only say of Kansas that it is undoubtedly one of the most productive States of the Union. In our State of Indiana it requires years of hard labor before we can boast of being in possession of a farm. Quite different is it in the Cottonwood or Arkansas Valley. There the husbandman in the second year harvests a full crop. . . . Your correspondent, in conclusion, holds it to be his duty to express his conviction that for the emigrant seeking a home there is no more promising region than Kansas. All products find ready sale at good prices. Facilities of communication are good, and the climate superior. — Correspondent Indianapolis (Ind.) Herald.

The atmosphere, particularly in the upper Arkansas Valley, is dry, pure, and refreshing, and is peculiarly favorable for those suffering from affections of the lungs. The winters are short, snows are not frequent, and remain but a short time on the ground. In the summer, during the hottest days, a cool breeze prevails, and the nights are always cool and refreshing. — Elyria (Ohio) Volksfreund.

In the various settlements founded but a few years ago, fruit is grown of such astonishing height and voluptuousness as we never see in Ohio. The land—a so-called alluvial soil—is in the highest degree productive, and needs but the plow to yield rich harvests. The climate is mild and exceedingly healthful, the atmosphere pure. The entire immense country seems to be intended by Providence for the future garden of Kansas. The Atchison, Topeka & Santa Fé Railroad Company, whose line traverses these plains, puts all levers into action to lend a helping hand to the new settlers.— Cincinnati (Ohio) Volksfreund.

In a public hall at Wichita, Sedgwick County, June 24, were arranged on exhibition, as the products of that immediate vicinity, four varieties of wheat (ripe), some stalks five feet high; three varieties of rye (ripe), six feet high; four kinds of oats (headed); corn, seven and a half feet high; cabbages in full head; potatoes, grown; flax, ripe; barley, ripe; besides five specimens of Hungarian grass, grapes, beets, radishes, wild-plums, etc. The show of products at Hutchinson was substantially the same as at Wichita. We deem it safe to say, that no section in Ohio, at a corresponding date, could make a better display than was seen at each of these points. — Toledo (Ohio) Commercial.

Though I am a native of Illinois, the great corn-growing State of the Union, and was reared at the plow and with the flock, yet I must confess to the superior excellence of these valleys over anything I have ever seen elsewhere. The corn is better, the wheat is better, the rye is better, the oats are better, the potatoes are better, the pastures are better, and the vegetables and fruits are better than in Illinois, because the seasons are earlier and longer, the soil is better, the climate is warmer, and the country is sub-irrigated, which makes it proof against drouth, as well as flood.— C. C. Strawn, Special Correspondent Pontiac (Ill.) Sentinel.

It is no extravagance to say that the rich valleys of the Cottonwood and Arkansas constitute the garden of Kansas, if not of the continent, and hence, the world. They rival in richness and beauty the far-famed Cedar Valley of Iowa, and offer those seeking homes opportunities but seldom met in a lifetime. — Cedar Rapids (Iowa) Republican.

The Atchison, Topeka & Santa Fé Railroad leads through one of the most attractive portions of Kansas. Were a traveller to form an opinion of the entire State by conclusions drawn from a ride over the above road, particularly during the growing or harvest season, he would find himself greatly in error upon visiting some other portions interior. The entire State does not average so well as along the line of the Atchison, Topeka & Santa Fé Railroad. This conclusion does not disparage other portions of the State, however, but shows the superiority, as a farming region, of that particular region indicated.—Jacksonville (Ill.) Journal.

TESTIMONY OF OBSERVERS.

Joseph Arch, the great English philanthropist and agricultural agent, says, in his report to the British Co-operative Agricultural and Emigration Society:—

I regard the soil and climate of the Arkansas Valley as the most temperate and attractive, and as offering better inducements to European agriculturalists than any other region in the world, not excepting South America.

Baron Von Brunoff, who visited America in 1873, in the interest of the Livonia Colony, wrote:—

I consider the region traversed by the Atchison, Topeka & Santa Fé Railroad as far superior as a wheat-growing country to our own; in fact, I am free to confess that as a wheat and fruit-raising region, it surpasses any portion of Southern Russia.

Vice-President Wilson, in 1875, said, in his address to his friends on his return home :—

But to you who are young, full of life, hope, and ambition, I say, Go to our newer New England, — the bright, broad fields of sunny Kansas. The Valley of the Arkansas River offers you everything that mankind can ask of Nature.

ABOUT SCHOOLS.

The youth of this commonwealth need not go "a thousand miles from home" to obtain a thorough practical or even classical education, for, to the credit of our law-makers be it said, in no department is a more generous liberality manifested than in the cause of popular education.

Aside from the common schools, Kansas boasts of several institutions of a higher order, foremost among which stands the State University, at Lawrence, with an eminently competent faculty, and occupying a building second in size only to the State University of Michigan. At Topeka we have Washburn College and the Episcopal Female Seminary; at Manhattan, the Agricultural College; at Emporia and Leavenworth each, a Normal School. Institutions are maintained also for the education of the blind and the deafmute. Business colleges are in existence in most of the large towns of the State.

Kansas has 233,000 children of school age, and more than 4,000 good school-houses. The interest-bearing school fund of the State amounts to



\$1,237,931, and there is a land endowment of \$3,000,000.

The March, 1878, disbursement of the semi-annual dividend of the State annual school fund amounts to over one hundred and fifty-one thousand dollars. This sum divided among them gives to each one the sum of sixty-five cents. Atchison County, having six thousand nine hundred and eighty children, received about \$4,537, — not an insignificant sum to revert to the children of the tax-payers.

SOMETHING ABOUT STOCK.

Kansas possesses superior advantages for stock-raising. The dry winters, splendid ranges, and low price of lands have induced the profitable investment of a large aggregate capital, which is being augmented every year. The average grade of cattle is far better than is usual, probably higher than in any other State.

There is no valid reason why Kansas should not rank among the first States in the Union for stock-raising. It is the uniform testimony of those who have had experience in the Eastern States that our nutritious native grasses are unsurpassed for butter and cheese. The cured hay does not seem to retain the nutritious qualities of the green grass; and it is necessary to feed more or less grain during the winter. The buffalo grass on the plains affords good stock-range all winter.

The Fourth Annual Report of the Board of Agriculture gives several letters from the chief sheep-raisers of the State. We reproduce parts of two or three of these letters:—

AGRICULTURAL COLLEGE FARM, Manhattan, Nov. 13, 1875.

Dear Sir,—I am very glad to do anything within my power for the advancement of sheep husbandry in this State; for I believe that Kansas possesses certain natural advantages which, when our people are properly educated, will make it one of the "great wool-growing States." I say, "when our people are properly educated"; for wool-growing is a different matter from growing corn or wheat, or cattle-herding; it demands a good degree of natural taste and special knowledge of the work, and the difficulties to be encountered in it. The considerable successes, no less than the disastrous failures, that have been made in wool-growing in this part of the State will, I think, bear me out in this statement. Without attempting to reply to your questions in the order in which they are propounded, I will endeavor to answer as fully as seems suited to your purpose.

First, among the "peculiar advantages" possessed by Kansas in this matter of sheep husbandry must be mentioned its climate. It is well known, both in Colorado and Kansas, that the dry atmosphere and soil of these regions are not only preventive, but a specific of some of the worst complaints to which sheep are subject, notably foot-rot and catarrh. I am told that the attacks of the astrus ova are also unknown. The great extent of unoccupied "range," covered with abundant grasses, found in every township, the abundance of excellent water, and the exceeding cheapness of hay for winter forage, must also be placed among the advantages possessed by our State in this matter.

But sheep husbandry as practised East, namely, as part of a system of farm management, is hardly possible in Kansas, except in rare cases. Here, sheep must be kept in considerable herds, with the herdsman constantly in attendance, and the range must not be limited. The reasons for this are, first, the abundance of dogs, wolves, and coyotes; second, expense of fencing; third, and most important, the general absence of "tame grasses" in Kansas, and impossibility of pasturing closely the native grasses without

destroying them.

Sheep introduced from the East should reach here as soon as possible after shearing, in order that they may become accustomed to our grasses while they are juicy and palatable. The commonest of all mistakes, and the prime cause of nine-tenths of the failures with sheep in Kansas, is neglect in this matter. The sheep, as purchased of Eastern farmers, are generally "broken-mouthed," worn-out specimens. These, arriving in the State late in the season, weary and exhausted from the long journey, are turned loose upon the prairies to feed upon the dry grass. It is not surprising that, under such circumstances, whole flocks frequently perish the first winter after their arrival.

In this latitude sheep should receive the protection of good sheds during the winter months, and the grass around the winter sheds should be allowed to attain as heavy growth as possible, so as to furnish feed during the fine weather of winter. To best accomplish this it will generally be found desirable to have the summer "corral" and winter sheds a considerable distance apart. For sound and healthy sheep, hay will generally be found a sufficient winter food, but aged sheep and lambs should have a little grain every day,

and will pay well for such extra care.

Respectfully yours,

E. M. SHELTON.

Under date of November 13, 1875, Mr. D. N. Barnes writes from Leavenworth:—

I raised sheep in New York, and have kept them in Michigan, Illinois, Iowa, and Kansas, and find that the climate of Kansas is the best for the purpose I have tried. My loss has been less than one per cent. annually from natural causes, and almost absolute freedom from disease.

Sheep need open sheds here, with range, summer and winter. Will fatten on any of the tame grasses or hay, but if kept on prairie hay should have

one pound of corn per head a day.

C. G. Stone, Esq., of Peabody, Marion County, says: -

My experience with both fine- and coarse-wool sheep is greatly in favor

of the West as a locality, especially Kansas.

My choice of sheep is the American Merinos; and I think the same of them as you write of the Berkshire pig,—the purer the blood the better. Fine sheep are like fine pigs,—they require good care; though I would not recommend every farmer to raise thoroughbred sheep, as we are too far from market for mutton, wool being the principal object, but would advise the use of thoroughbred rams on grade ewes, as, in that way, flocks and quality of wool can be improved with slight expense. Grade Merinos will stand herding in large flocks better than any other sheep, as they require less care and attention, and will clip more wool.

One great advantage in this State is that we can raise as much wool on land worth from five to ten dollars per acre as can be produced in New York on land costing one hundred dollars per acre; and we can send our wool to their market for three cents per pound.

Another advantage is, no grass is so well adapted to sheep-raising as that on the wild prairie uplands, these uplands being a sure cure for the foot-rot so prevalent in the Eastern States; and for protection from cold winds and storms a few poles, covered with hay or straw, which many farmers burn to get out of the way, answer an admirable purpose. Every farmer in the State of Kansas can keep one sheep to every acre of land he owns, and in no way interfere with his farming and crops, converting every straw that grows on his farm into wool and the best of manure.

My experience with sheep in Kansas for five years past is quite as favora-

ble, if not more so, than formerly in the State of New York.

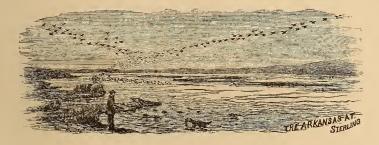
A MAMMOTH HERD.

One of the largest and most interesting experiments at stock-farming on a mammoth scale in this country, says a writer in the New York Times, is that which was instituted, some six years ago, in the then uninhabited region of Kansas, by the late Mr. George Grant, of London, England. Mr. Grant's estate is known as the Victoria Colony, and is situated in Ellis County, Kansas, two hundred and fifty miles west of Kansas City. His first purchase gave him an area of two hundred and fifty square miles, to which he afterwards added several other purchases, so that he owned, at the time of his death, in April, 1878, probably the largest tract of farming and grazing land ever owned by any one individual in this country.

In the matter of stock-farming, Mr. Grant's experiment has been upon a very large scale, and eminently successful. Although his crops for the first year were nearly destroyed by grasshoppers, that did not materially interfere with the feeding of cattle upon the buffalo grass of the plains, which is affirmed to be the most nutritious grass that grows, even more so than the famous blue grass of Kentucky. Mr. Grant's specialty was sheep. He began with a flock of three thousand five hundred and fifty-five breeding ewes, and sixty long-woolled English rams of the highest pedigree, and from the first flocks in England, consisting of Oxford Downs, Leicesters, Lincolns, Cotswolds, and Southdowns. He had about fourteen thousand head of sheep, and two thousand graded cattle.

Mr. Grant thus wrote, under date of Dec. 20, 1871, to Alfred Gray, Esq., the Secretary of the Board of Agriculture:

Dear Sir, — It would be difficult to determine, there being so much controversy on the subject, which is really the best kind of sheep for Kansas. Although I have changed my ideas in some respects relative to the different breeds of sheep raised in America, yet I will always maintain that a cross between the graded Merino ewes and English rams, such as the Oxford Downs, Southdowns, Lincolns, etc., produce a sheep which will never fail to be in demand in the market, and whose wool will find a readier sale than that of the fine-bred Merino. What we want in this country, in short in any country, but more especially in this, is a wool which will meet, not the requirements of a few, but those of the mass of the population. Such a wool is the one I describe. Let the Eastern States, in close proximity to the woollen factories, cheap transportation, and superior advantages in feeding and handling, continue to raise the fine-woolled sheep. It will pay them, and at the same time supply the wants of the nation; but on the plains, where the country is unsettled, where land is so cheap, grass and water so abundant, we have advantages for entering into the industry which they never can embrace in a thickly-populated country. I do not know a State in the Union so well adapted for sheep husbandry as Kansas, or any which is destined in the future to take such a prominent position in this particular industry. If Colorado, with her meagre herbage of bunch grass, California, with her injurious sand-burrs, hot and rainy seasons, or Texas, with her brush and galling insects, prove to be a desirable home for the sheep, why should not Kansas, with her rich, rolling prairies of buffalo grass, her pure streams and dry, genial climate, prove doubly conducive to the raising



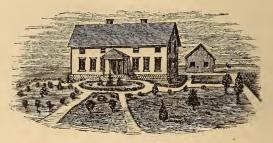
of an animal so essentially necessary for the clothing of mankind? The industries of Kansas are yet in their infancy, but every year reveals more or less of her large resources. Her efforts at agriculture have occasionally been thwarted, but her adaptation for stock-raising has not been yet questioned.

WOOL GROWING.

South-western Kansas is preëminently adapted for the raising of sheep, as throughout the entire country on either side of the Santa Fé Road east of the cattle quarantine at Dodge City, the range is practically unlimited. In this fact alone lies one of the greatest advantages possessed by the Arkansas Valley over Colorado, the claim of the cattle-men of the latter State of priority of the occupation of the range causing no little ill-feeling between those engaged in the two interests. While certain portions of Colorado and New Mexico are already practically closed against sheep-raising, it is thought by many who have considered the matter seriously, that it is but a question of time when the sheep-range of Colorado will be confined to such exceedingly narrow limits as to render the herding of large flocks anything but profitable. It will well repay those impressed with the advantages of wool-growing in

this section to write to the land commissioner of the Santa Fé Road at Topeka, who in response will at once forward a pamphlet devoted to sheep interests, maps showing the grant of the company, the lands sold and unsold, and much other valuable information, not only as to railroad lands, but government lands as well.

The securing of a pleasant home with a well-tilled farm about it in the beautiful Valley of the Arkansas, in south-western Kansas, with full and profitable control of an unlimited sheep-range, has great attractions for those who in the older States keenly appreciate the advantages and pleasures of such a life, and, while greatly desiring to enter upon wool-growing extensively, have only such facilities as enable the gratification of this desire upon a small scale. In the Arkansas Valley, a thousand sheep wintered at home may, early in the spring, be sent out upon an unlimited range, and, cared for by experienced herders, return late in the fall, old and young in perfect condition, the only expense of the spring, long summer, and protracted fall being the pay of the herders, any number of whom can be had at the rate of \$10 to \$15 per month. But the sheep-men who make wool-growing their



WELL TO DO.

sole business, and to whom all other pursuits are secondary, are rarely if ever content with less than a range entirely under their control; and this class find in the valley inducements not equalled, or, in fact, approached, on the continent. There are millions of acres of government land, the finest for sheep-raising in the gift of the nation, to be had in south-western Kansas merely for the preemption fees, while the thousands of acres of railroad land are to be had at prices hardly averaging \$2.50 per acre. Millet and rye are two of the surest crops in the section of country referred to, while timothy, alfalfa, and tame grasses are grown with the greatest facility. When permanently located one may readily raise corn, rye, millet, clover, any or all, and thus always have feed for stock, while, if it be deemed advisable to go into winter wheat, experience has proven that its growth in the spring is greatly enhanced by permitting sheep to range upon it during the winter months. While many of the sheep-men in the valley carry their flocks through winter as well as summer without feeding a pound of grain, it is generally looked upon as a good thing to have it on hand in case of an emergency. The loss

from disease in this section is exceedingly light, — Mr. Wadsworth, one of the heaviest breeders in these parts, not having lost a single sheep from dis-



TWO YEARS FROM RAW PRAIRIE.

ease in all his herd, of three thousand and more, for upward of a year. Mr. Wadsworth says: "In regard to this country as compared with others, for sheep-raising, I would say I do not see how any one in any of the Eastern States can compete with those here in the production of wool, it costing so much to winter stock where there is no winter range, and requiring too

much high-priced land to feed upon in summer. As to Colorado, I think the country there overcrowded now with all kinds of stock; and even if such were not the case, it is liable to very hard storms and deep snows, and without hay or grain very heavy losses of stock are often suffered. In addition to this, the cattle and sheep-men in Colorado are not on the best of terms, and are having trouble regarding the right of range. Another disadvantage is the low price Colorado wool rates in the market; and, summing all up, I think this country far preferable to any I know of for the wool business. I am confident that any one can come here with sheep, managing them as he should, and realize fifty per cent. on the investment." To prove that it can be done, Mr. Wadsworth declares the following to be a summary of his first year's result: one thousand ewes, second cross, \$3,000; fifteen bucks, \$150; hay, \$75; corrals and sheds, lumber, \$300; loss on sheep, \$100; shearing and other expenses, \$300; one shepherd, \$300; total, \$4,400. Credit by eight hundred lambs, \$2,000; credit by wool, \$1,200; total credit, \$3,200. Less expenses, \$1,250, the net profit upon the investment of \$3,000, and aggregate of expenses, \$1,250, was \$1,950. The item of \$300 for corrals and sheds should really appear as a portion of the investment, being permanent improvement, and reducing expenses of subsequent years.

The Hon. Cyrus Frye, Postmaster at Larned, gives his expenses upon an

original flock of four hundred and seventy-eight sheep for twenty months, including the \$1,075 paid for the sheep, at \$1,516, and the returns \$2,885.85, a per cent. of profit on the investment in twenty months of 90\(^3_4\), equal to 54.2 per cent. per annum. No account is made of sheep killed for family use, averaging two per month during summer, and one per month during winter. Only thirty-eight sheep, including those killed for family use, were lost during the entire twenty months.



THREE YEARS FROM TREELESS PRAIRIE.

Mr. Samuel Archer, of Kansas City, the most noted fine-wool breeder in

the new West, says of the Arkansas Valley and south-western Kansas generally, quoting his exact words: "I regard the grasses of central and south-western Kansas as better than those of Colorado, New Mexico, or any portion on the west side of the plains. The east side of the plains—south-western Kansas—is undoubtedly the best in every respect; the grasses grow thicker on the ground, and grow longer. I am persuaded that alkali is injurious to the wool; in fact, experience with the wool of northern Colorado and northern Kansas has proven this beyond all dispute. The water facilities are much better in south-western Kansas than in any other section I know of in the West. Another great advantage over northern Kansas and Colorado is the milder winters, fewer storms, and lighter winds, thus not calling for so much expense in providing shelter and feed.

CATTLE RAISING.

Passing Spearville, the next point of prominence on the line of the road is Dodge City, the centre of the cattle-shipping interests of south-west Kansas, northern Texas, and eastern Colorado. Dodge City is on the eastern limit and inside the Texas quarantine grounds, or, as every one hereabout terms it, the cattle dead-line. It is for the protection of the native cattle of the State that the Legislature defines the boundaries within which stock fresh from Texas shall remain for a certain period of time; though this, as a matter of course, has no bearing upon the shipment of cattle to the Eastern markets immediately upon arrival at Dodge, it applying entirely to driving and grazing. In this almost limitless expanse of Nature's own domains for supplying beef for the continent, the portion of the country restricted by the quarantine line is as a mere garden-patch, the cattle-man having open to him the entire territory from the line of the Santa Fé in Ford County, south to the Indian Territory, south-east to the Sumner County line, including the incomparable cattle range throughout Barbour, Harper, Kingman, and Stafford Counties, known as the Medicine Lodge Country. South-west the territory is unrestricted, not only to the boundaries of Kansas, but as far out upon the great stock plains of Colorado as one cares to go. Throughout this vast and unsurpassed section for cattle herding, grazing, and driving, the advantages for handling stock are simply beyond computation or detail, and the opportunities for gaining large returns from investments innumerable. Until recently, and during the many years the great cattle-drive from Texas has centred in south-western Kansas, the cattle arriving from that State, or "the drive," as it is so generally called in the West, was, as a whole, shipped East, the cattle being driven in, in fact, for no other purpose. The cattlemen who make the drive and subsequent shipment their business visit Texas during the fall and winter months, and, making their purchases of large mixed herds, bring them up to graze in the Arkansas Valley and other regions north and south of the road. If the Eastern markets are in condition to warrant it, the cattle are shipped at once; if not, they are sent forward from time to time during the few succeeding months, improving, of course,

all the time they may be held on the range. But of late an entirely new feature of the cattle business has been most successfully inaugurated, that of buying small herds, from two or three hundred up to one or two thousand, out of the drive, and taking them back into the sheltered and broken country found within fifty to one hundred miles on either side of the road, but more especially south, and there hold and graze them for one, or two, or as many years as one may choose.

In these terribly dull times in the East, when it is so exceedingly difficult for young men to get any sort of start in life, the advantages of operating even upon a small scale in this great feeding-ground of the nation are all the more strikingly apparent, and already a very considerable number of young men of highest standing in Eastern commercial and social circles are actively engaged here.

The total "drive" from Texas last spring and summer — May 15 to July 15 — was 280,000. Of these 100,000 went north to the Union Pacific coun-



try, some 60,000 were held in south-western Kansas, and the remainder shipped East. In 1873, in the country south of Great Bend and Dodge City — Great Bend being then the cattle shipping point — to the State line there were not to exceed 10,000 cattle upon the range. In 1874, there were about 25,000; in 1875, about 35,000; in 1876, 45,000, and last year, 1877, as hitherto stated, 60,000. In addition to the thousands wintered in south-west Kansas last winter there were some 30,000 in the northern part of the Pan Handle of Texas and tributary to the Santa Fé Road.

Of the drive, the early cattle are usually in the best shape, because these come from northern Texas, and have a shorter drive. They are also a better class of beeves than coast cattle, which are coarser and longer-horned. The profit in the business of purchasing either class of cattle with judgment is owing to the little expense, from the country being so peculiarly adapted to stock,—such nutritious grasses, plenitude of spring-water that never freezes,

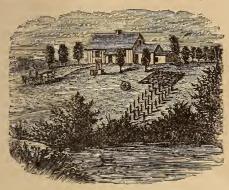
and no outlay for shelter or feed. The change of climate adds immensely to the condition and value of the cattle; for here they take on fat readily, having no troublesome flies or extremes of heat to annoy and debilitate them. Texas two-year-olds can be grazed and fattened here for one year,



and sold at three years old for from eighty to one hundred per cent. profit. The ruling rates at Dodge City prove this beyond all question, as, for instance, Texas two-year-olds sold last summer for \$14, and the same beeves wintered and grazed in Kansas until the present year, when they are of course three-year-olds, sell for \$24. And now the question naturally arises as to the expense of the year's keeping. There is almost any number of parties with herds of their own upon the range, and it being practically unlimited, the ex-

pense of adding to the extent of the herd is simply one of increased help, and as herders' wages per month average about \$25, the item is not of very great proportions. It is a common practice for other owners. non-residents, or those not caring to devote their time individually to their cattle, to place their herds with those of parties attending personally to the stock upon the range, and the ruling rates governing such proceedings are \$2 each for yearlings, and \$2.50 each for cattle two or more years old. Each owner's stock is branded with his own recorded brand; hence there can be no trouble as to proprietorship, and as the owner of the main herd recognizes it as his own best interest to take the best possible care of his stock, and the combined herd grazing in common, there can be no discrimination, and all in the herd necessarily receive equal attention. Generally three or four owners giving their time to the care of the cattle lay claim by right of occupation to some particular range, with running streams of water permeating it, and driving their stock upon it locate their camps or cabins at equidistant points. Twice a day, every morning and afternoon, the entire limits of this range are visited, some one riding in both directions from each habitation, and, meeting at half-way points, retrace their respective routes to starting places, this being called in herdsmen's parlance "riding the range." Thus the range is patrolled every day in the year, and the cattle not only prevented from reaming beyond the particular range upon which they are placed to graze, but all outside intrusion guarded against. The percentage of loss by death during the year will not exceed two per cent, and one can figure for himself what his profits would be upon an investment in Texas two-year-olds at \$14 per head, paying \$2.50 per head for their keeping, allowing two per cent. for loss, and selling them at three years old for \$24 per head.

The same cattle kept in Texas until three years old would increase in value but very little, the change of climate making a most marked difference in weight and condition. Most of those who have engaged in the busi-



A MENNONITE SETTLEMENT.

ness of purchasing cattle and holding them for the year, as indicated, have found it so profitable as to decide upon reinvesting their profits in more extensive operations; and of this class we will take the figures of a gentleman who copied them from his own books, from accounts opened last spring, when he commenced in his enlarged field of investment. His total of expenditure for live stock was \$23,075. His ex-

penses at the expiration of the year will be \$3,000. At the end of the year, his herd, which cost him \$21,600, will be worth \$33,750, leaving a net profit for the year of \$9,150, or forty-two per cent., and this not taking into account the cost of mules, horses, bulls, and outfit still on hand. An allowance should, however, be made for loss during the year, which, at two per cent. for the herd entire, would reach thirty head, worth \$450, and which, deducted from the net profit as given, would make it \$8,700.

A calculation made upon a basis of two years' keeping brings interesting results. Take, say, one thousand Texas yearlings bought September 15, at Dodge City, for \$8,000; keep them two years, and sell at corresponding date these three-year-olds, double wintered, which is much better than single-wintered; should weigh nine hundred and twenty-five pounds, and at the very lowest estimate would bring three cents per pound, \$27.75, at Kansas City. The freight per head from Dodge to Kansas City would be \$2; commission for selling, 50 cents; yardage, 20 cents; or a total expense of \$2.75, leaving the net receipts per head \$25. The loss by death per annum, at two per cent., would be forty head, which deducted from the one thousand head would leave nine hundred and sixty at \$25 per head, \$24,000. The next thing to consider would be the expense, which would be \$5,000, which added to the \$8,000 paid for the cattle would make a grand total of investment and expense of \$13,000, leaving a clear profit of \$11,000, or forty-four per cent. per annum for the two years' operations, requiring but \$13,000 in way of capital, all told.

Another gentleman, engaged quite extensively in breeding and fattening cattle, hands us a careful balance of the books, which shows an aggregate value of \$53,280, and aggregate expenses of \$24,000, leaving the very comfortable profit of \$29,280 on five years' operations, based upon an original capital of less than \$10,000. Should one wish to commence upon a smaller

capital, say \$4,500 to \$5,000, the figures given by a young New Yorker, who started last summer, cannot but prove of value, based as they are upon the operations of a gentleman of no previous experience whatever with capital. He invested \$3,300 in cattle, \$550 for an outfit, and his running expenses, reaching \$460, make the aggregate of expenditures the first year \$1,000, and, his stock being now worth \$7,580, the net profit reaches \$2,280.

These figures require no extended comment, carrying, as they do, the impress of fact upon their face, and proving most conclusively the preëminence of the cattle business in south-west Kansas as a source of profit, which is rarely, if ever, below forty per cent. upon the investment made. The great demand that has sprung up in England the past year for American beef, the introduction of refrigerator cars, and the limited area of grazing grounds east of the Missouri all tend to farther enhance the value of south-western Kansas as the great feeding grounds of the continent.

ATCHISON, TOPEKA & SANTA FÉ RAILROAD.

WHAT IS THE SANTA FÉ ROUTE?

Very few people, comparatively, are aware of the length and character of the Santa Fé Route. It has been built so quietly and rapidly, has penetrated such an entirely new country, that it comes to many as a great surprise to learn that a railroad, operating seven hundred and eighty-six miles, including branches, extending from the Missouri River to the Rocky Mountains, has been built since 1870.

It only requires a glance at the map of our country, and the important geographical position the Santa-Fé Route occupies, from Atchison and Kansas City, on the Missouri River, to Pueblo, at the base of the Rocky Mountains in southern Colorado, following the finest stretch of country in the West, through the Arkansas Valley, to comprehend that this is really one of the most important railroad routes in the West, having at Kansas City and Atchison the most complete system of Eastern railroad connections, and in its course opening up and reaching forward to that portion of the new West which is known to be the most wealthy in agricultural and mineral resources, and is attracting the attention of immigration more than any other portion of the West.

By studying the map of our country, one can comprehend rightly the important position occupied by the Santa Fé Route. It is the most desirable temperate belt of latitude. A large portion of the country opened up for settlement by its construction is known and admitted to be the finest body of country yet discovered in the West, and is filling up with population more rapidly than any other locality, and consequently is offering the best field for opportunities to the farmer, the stock-grower, the merchant, and the manufacturer. Where population is pouring in rapidly, where towns are springing from knolls into cities, almost by magic, with an unsurpassed agricultural country to sustain them, — there is the field for opportunities.

The main line of the Santa Fé Route starts from Atchison, on the Missouri River; it runs in a south-western direction to Topeka, the capital of the State, where it makes connection with a branch sixty-six miles long from Kansas City. Leaving Topeka, one of the most beautifully located cities in the Western country, it continues south-west through Carbondale, Burlingame, and Osage City, the three principal coal-mining towns on the line, to Emporia, a handsome, growing city of twenty-two hundred inhabitants, possessing the State Normal School, and at the crossing of the Missouri, Kansas & Texas Railroad, which gives a connection with tide-water at Galveston, Texas. From Emporia the course of the road is almost due west, following the beautiful Cottonwood Valley to Newton, passing through a region which has been aptly called "The Garden of Kansas," a large portion of which is similar in almost every characteristic to the famous "Blue Grass Region of Kentucky."

At Newton, a branch extends south twenty-seven miles to Wichita. From Newton the main line of the road runs directly west, following the fertile valley of the Arkansas River to Pueblo, at the base of the mountains, and six hundred and eighteen miles from Atchison.

The road is now completed to Pueblo, giving a direct eastern outlet to the immense business of southern Colorado, New Mexico, the famous San Juan mining region, and Arizona; and furnishing a valuable Western market for the surplus products of the valley, and giving to the traveller from the East the most direct all-rail route to all of southern and western Colorado, including nearly all the attractive pleasure resorts, — Colorado Springs, Pike's Peak, Manitou, the Garden of the Gods, Denver, Cheyenne, and Grand Canyons, etc., etc., the San Juan mines, New Mexico, and Arizota.

Those who own and control the road are men of Boston, capable of performing thoroughly all that they attempt.

The road itself speaks well for the present, and is a striking symbol of what will be done in the future. Built in the most thorough manner, with fifty-six-pound splice-jointed iron, oak ties, Howe truss bridges, stone culverts, rock ballast, substantial station-houses, etc., it shows plainly that it has been built to stand for all time, and to perform the duties of a great through line.

One point, however, of the greatest importance to the settler is this: The road has fewer grades and slighter grades than any other railroad in the West for the distance operated, and, as a consequence, as soon as there shall be enough business to justify the running of more than a limited number of trains, its rates can and will be reduced to a very low figure.

The land-grant through which this company has built its road has been justly called "the best thing in the West."

To the farmer and stock-raiser it offers magnificent opportunities, and when in addition to all the natural advantages presented by this company are added the artificial advantages which this railroad enterprise has given it, it needs only the casual examination of the inquirer to make it command attention above all similar enterprises.

Although the present western terminus of the Atchison, Topeka, and Santa Fé Road is now at Pueblo, the demands of the times will not long permit it to remain there. We predict that it will not be many years before the same enterprise which carried the road steadily and successfully onward and outward across the States of Kansas and Colorado will find for it a new route across the mountains to the Pacific, and double if not treble its importance to the country at large. As it is, passengers at Kansas City and Atchison find in its prompt and convenient connection with all trunk lines from the East and South a strong argument in its favor.

The Atchison, Topeka & Santa Fé Road has already become the favorite line to the mountains, a position which it has attained not only through the attractiveness of its route (which follows the river all the way from Newton to Pueblo), but owing to the courtesy and liberality of its officers. That it will long continue so, there is no reasonable ground for doubt.

The operating department of the road is in first-class condition. The rail is new, the bed laid with great care, and the time made from Kansas City to Pueblo is altogether remarkable. The operating and clerical force is under splendid discipline, and is made up almost wholly of young men skilled in the work. The latest and best style of parlor and sleeping coaches has been placed upon the line, and from the base of the mountains, via the beautiful Arkansas Valley, it is a magnificent highway, alike for the pleasure-traveller, health-seeker, and land-looker.

SOME RECENT OPINIONS.

LETTER FROM HENRY WARD BEECHER.

LEAVENWORTH, KANSAS, March 28, 1878.

The early history of Kansas attracted universal interest. Upon this State it was that slavery stumbled and was broken, and under the forces which Kansas represented slavery was ground to powder. The colonies which on the abolition of the Missouri Compromise were formed in the North came to Kansas, both for the bettering of their temporal condition and for the defence of liberty. In this respect Kansas had a history parallel with that of the early colonies of New England, except in this, that the Puritans and Pilgrims left their enemies behind them, while the Kansas pioneers emigrated into the very midst of bitter adversaries. It was a sagacious but audacious scheme to plant a Northern State with Northern institutions so far south, right alongside of a notable slave State, and thus defy a comparison between the two styles of commonwealths.

Next, Kansas has shown the true spirit which frames great States, in providing for popular education. Her schools are admirable, and have been from the beginning. They have grown out of the will of the people themselves. The people are proud of them. They spread with the population. Emigrants do not leave churches and schools behind them; they find them everywhere. To-day a country is wild and without inhabitant; to-morrow it has its tens of thousands, and the day following it is an old, settled country! More than a quarter of a million emigrants will settle in Kansas during this year. They are not, for the most part, foreigners, to be broken into our language, customs, ideas, and civil usages. They are from the North-west, the North-east, the Middle States, — men of some little substance and well stocked with ideas.

The admirable exhibit which Kansas made at the Centennial opened the eyes of thousands, and has drawn hither tens of thousands who could imagine no better agricultural paradise than the land which produced such fruits and grains. The fever of speculation which distempered this goodly State is over. Men have come back through suffering to economy, to salutary toil, and to moderation of desires. Slowly but surely the people are recovering from the miserable mania of extravagance and speculation. Hope prevails, but it is chastened. No wonder men were elated. I can scarcely conceive of anything that would so intoxicate an Eastern man, accustomed to forest-covered lands or penurious soils, as a ride through Kansas. — In the Christian Union.

[Rev. W. H. H. Murray, in the Golden Rule.]

Any man fitted either by nature or experience for out-door work, with sound health and plenty of grit, can undoubtedly find better chances of success in some portions of the West than he can at the East. But he can win there, as here, only by paying the price of success. If he can live in a boardshanty or a log-hut — live on plain fare, and work hard, as his neighbors do, — in short, adapt himself to the healthful hardships and needful thriftiness of a new country, he may be independent, and give to his children the boon of a fair start which they might never have here. But he must readjust his views of the relative value of things. The so-called necessities of our older communities are luxuries in the new, and our luxuries are there largely unknown. "Nature's favors are pretty evenly distributed, after all," says the Tribune; or, in the epigrammatic language of the Concord philosopher, "If we have one good thing, we pay for it by the loss of some other good thing." The law of compensation holds especially true in respect to localities, and he who seeks a country not hampered by drawbacks will fail to find it, this side the better world - just as he ought to fail who seeks for success in any calling without being willing to pay its fair equivalent.

GO WEST.

Since Horace Greeley first gave the advice, it has never been more pertinent than now. It never has pointed more clearly to a solution of social and national troubles. We people who once had the honor of being called Western, an honor we are rapidly losing, have been in the habit of recommending the westward movement on personal grounds. We have even boastfully maintained that the snap and nerve of the East are steadily coming West, and that only on the freer and broader theatre of the West are the vigor and energy of young manhood fully developed.

This fact still holds, and remains a sufficient reason why young men should go West, even when the West means a land far beyond us, and when the advice may deplete our own neighborhood. But there is also a more general reason for the counsel. It is based on a philosophic consideration of the wants and condition of our entire country. One great remedy for the ills of the body politic, and specifically for the cure of that great and well-nigh chronic disorder called "hard times," is a shaking-up of the overcrowded nests of our centres of dense population, and a movement toward our magnificent heritage beyond the Missouri.

Those who imagine that emigrating to them will carry them beyond the pale of civilization, to a country as remote and inhospitable as twenty years ago Massachusetts pictured Illinois to be, should be told that in many of the new towns of that region they will find society that will, either for intelligence or morality, compare favorably with that by which they are now surrounded. The line of the Atchison, Topeka & Santa Fé Railroad is dotted with villages and towns every few miles, where churches, schools, and good society will greet the emigrant on his first arrival, while the land,

adapted to general agricultural purposes in the western part, especially to grazing, is rich enough and fair enough to stir the blood of a Cincinnatus.

With this country before a young married couple, every climate beckoning and every industry loaded with splendid rewards, how they can settle down in two rooms that look out on an alley, and a stone wall within reach of a clothes-pole, and contemplate life on a shaky thirty dollars a month, and call it happiness, is a mystery the bottom of which our philosophy has never been able to strike.

Now what the country needs is that its great farm be farmed. It needs a diminution of consumers and an increase of producers. On that general path our wealth must come. Let us awake to the fact. It is a hopeful sign that a thousand a day are said to be pouring into Nebraska, and that the south-western trains are loaded with people who are going to make homes for themselves in those fertile regions. There is no better way for government to help the country than to find ways of encouraging the settling of the West. A hundred thousand farmers are wanted for the north-west, a hundred thousand for Nebraska, a hundred thousand for Kansas and Texas. They will find, not a wilderness, but a beautiful land waiting to be transformed into a garden. Hard work and patience will give them in their new homes, not only the comforts of life, but, gradually, all their children will need of society and education.

When thus the West is opened, the tide of blessing will be refluent, and fill our channels of trade, and bring life and health to every part of the country. We write these words in no interest but that of our country and of the hundreds of thousands half starving in crowded cities, fighting the wolf half the year round, and never "ahead," who might with far less anxiety and no more toil be laying the foundations for a competence for their children, while themselves constantly employing the rewards of their healthful industry. — The Interior, Chicago.

THE STRUGGLE FOR LIFE.

The cities are the head-quarters of a vast amount of this misdirected talent, effort, and energy. There the idle and unemployed literally swarm, seeking for work or for assistance to enable them to live. In many cases they find little or nothing to do in the line of employment they seek, but still they remain, picking up an irregular and precarious subsistence as they best can. All kinds of business are beset with applicants for situations, when it is difficult to find profitable employment for those already engaged. Salesmen, book-keepers, and clerks out of place are literally too numerous to mention, while in the higher departments of business, as well as in the wide field of manual labor, the excess is equally great. The unemployed manage to live, however, in some mysterious way, although how they do it will probably never be generally understood. The unpaid bills at boarding-houses and hotels, the borrowed money, the contributions of charitable friends or relations, the free lunch, the soup-house, and the station-house lodging indicate some of the methods resorted to, even when crime is not directly added to

the list. They live, in short, on the community, to whom they make no advantageous return.

Judging by the number of the unemployed, it might well be supposed that, from one cause or another, there was absolutely nothing for them to do in all this vast country. Such an idea we regard as the merest nonsense. It is born of a feeling of dependence upon others, which, more than anything else, is destructive of true manhood. Thousands, like Micawber, are waiting for something to turn up for their benefit, who never think of turning up something for themselves.

No man with health and strength should consider himself as absolved from doing any work at all unless he has the means of supporting himself without work. If they wait to gratify their tastes in regard to the business of a life, they should at least labor while they wait. But the impression that there is nothing to be done in this country whereby labor may be made self-supporting is at all times an erroneous one. Mere support does not mean a great deal to an individual. It means a certain amount of food, a little clothing, and some kind of shelter. The hardy pioneers in this country were able to obtain it in a howling wilderness, and under circumstances much more difficult than would be encountered by any who might now seek for it on an independent basis.

Thousands of acres of land in New England, run out or unimproved, and millions in the teeming West and South offer support, at least, to all who will cultivate it. It offers support, and, what is more, independence and competence to those who devote themselves with industry and intelligence to the development of its bounties. But agricultural labor has lost its attractions. The farmer's sons leave the paternal acres and flock to the cities, leaving the sure employment there offered, and for which in most cases they are the best fitted, in search of business in fields already over stocked. By their success or failure in their new ventures, their course is properly enough to be judged; but it is certain that too many of them play a losing game in the battle of life, Cheap clerkships, temporary employment as drivers of teams, as horse-car conductors, or as waiters and tenders in restaurants and saloons, with but little pay and less credit, is too often the result of their endeavors for position. When these means fail, they too often degenerate into idlers and loafers, with a love of excitement fully developed, and all disposition for good, honest work thoroughly destroyed. Has the change from the farm to the city been of any benefit to them or to the country? In too many cases we fear a negative answer must be returned. But personal freedom of action is not to be circumscribed. The world, as well as to others, is "before them, where to choose"; but when so many of the unemployed who are living upon the community, and doing nothing to support themselves, are complaining of their hard lot, and calling upon the Hercules of capital to raise them from their unfortunate condition, it is worth while for all to remember from what source relief may come. - Boston Daily Advertiser.

WESTERN HOMES.

The minds of the better element among our laboring people are turning to agriculture as a relief from the oppression and want of city life. The only possible relief is to go out upon the teeming prairies of the West, and by hard, honest toil carve out a livelihood and future. They must expect to work early and late, and to toil harder and endure more than they have been accustomed to endure, — at least, at the outset. Unless they have the nerve to meet privation and toil, it will be foolish to think of going. Hence any who have not stout hearts and strong hands should not go. Those unwilling to endure some privations should not go. Those who are will gradually accummulate the comforts of home, and a plain, but solid and honest, competence for their children. The sooner labor starts in such direction, the sooner we shall have prosperity. It is one of the elements of prosperity. We therefore urge those who can meet the conditions to go. The effeminate and irresolute will not better their condition by going. — Pittsburgh Commercial Gazette, March 23, 1878.

SELF-HELP.

Now is the time for Americans to practise the lesson of self-help. The prospects of business are no better this spring than they were one year ago. Building in all its branches is suspended; the capitalist holds his store of money tightly in his hands; trades are failing; values are shrinking, and thousands who thought themselves prosperous must begin the work of life anew. The present is one of those testing seasons which try the manliness of a race. And if we are descended from a good stock, as we claim to be, we ought, with God's help, to bear the test well.

Prof. Lowell, in his "Biglow Papers," describes the Yankee as having been taught by stern necessity to adapt himself to novel situations. "He will invent new trades as well as tools. Put him on Juan Fernandez, and he would make a spelling-book first and a salt-pan afterwards." But it may be queried whether this energetic, typical American has not of late been benumbed in his faculties, and whether, with a whole continent before him awaiting the shaping touch of his genius, he has not been subdued by fear. We occupy a country very thinly inhabited. Population has, in very few of the States, reached the average density of one hundred and twenty to the square mile. We hardly know yet the geography of our great estate. Year after year government explorers return and tell us of broad lands yet to be occupied, known to us only by name heretofore. One single State in the south-west is capable of sustaining as large a population as England. And yet young men are complaining that all positions are filled. Skilled laborers are standing in the market, and when reproached with idleness answer, "No man hath hired us." In view of the resources of our country, this is a wonderful phenomenon. We Americans must acquire a larger way of thinking, and must grow more in the grace of self-help. - Illustrated Christian Weekly, May 2, 1878.

KANSAS.

The story of the settlement and growth of Kansas is inspiring. It is one of the brightest chapters in our national history. The heroic struggle of her people for a free territory early gained for them the admiration of the lovers of liberty everywhere. Her growth has no parallel in the history of emigration. Admitted into the Union in 1861, only seventeen years ago, with a population of one hundred and seven thousand, she now numbers more than twice as many people within her borders as can be found in Vermont or New Hampshire, more than three times as many as Rhode Island contains, four times as many as Florida, and five times as many as Delaware. As an indication of the enterprise of the State, and of the belief of capitalists in Kansas as a good place for investment, the notable fact may be mentioned that already she is the eighth State in the Union in extent of its railroads. The whole of New England has only twice as many miles of railroad as this new commonwealth not yet twenty years old.

Napoleon Bonaparte, then First Consul of France, sold to the United States, in 1803, the province of Louisiana, which included nearly all of Kansas, and comprised 1,160,577 square miles, a domain much larger than that of the original thirteen colonies, which was only 820,680 square miles. The whole amount paid to France by the United States, in principal and interest, was, for this vast territory, less than \$24,000,000.

Early in 1870, while Louisiana was yet a province of Spain, Benjamin Franklin wrote to John Jay: "Poor as we are, yet, as I know we shall become rich, I would rather agree with the Spaniards to buy at a great price the whole of their right on the Mississippi than sell a drop of its waters. A neighbor might as well ask me to sell my street door." The treaty with France for the acquisition of Louisiana was ratified by the Senate on the 20th of October, 1803, and thus a pathway was opened forever to that great central portion of the American continent which is already the chief basis of its agricultural and mineral productions, the best exemplification of its miraculous progress, and the centre of its political power.

In 1804, Kansas became a part of the District of Louisiana. In that year the expedition of Lewis and Clarke left St. Louis. In 1805, Congress changed the District of Louisiana to the Territory of Louisiana, still embracing Missouri and Kansas. In 1812, the Territory of Orleans became the State of Louisiana, and the Territory of Louisiana was changed to the Territory of Missouri.

In 1819, by a treaty with Spain, the western boundary of Louisiana Purchase was adjusted. That part of the present State of Kansas lying east of

the twenty-third meridian (one-hundredth Greenwich) and north of the Arkansas River did not form a part of Louisiana, but was acquired from Mexico. It contains seven thousand seven hundred and seventy-six square miles.

In 1820, Congress passed an act enabling the people of Missouri Territory to become a State, and prohibiting slavery in all of the Louisiana Purchase which lies north of thirty-six degrees and thirty minutes north latitude. The next year Missouri entered the Union as a slave State. St. Louis then had Jess than five thousand people.

In 1823, the first wagon-train from Missouri to Santa Fé passed through Kansas. This was the beginning of the commerce of the plains.

In addition to her native Indian tribes, Indians of Eastern States were given reservations in Kansas. This policy was followed by the government until 1854, when the policy began which has sent them all away. Until the year last named, the only white residents of Kansas were those connected with Indian missions, or traders with Indians, or white persons, usually French, who had married Indians and adopted their mode of life. The three classes combined probably did not number more than one hundred and fifty persons.

The "Santa Fé Trail," a wagon-road from Missouri to New Mexico, was established by Major Sibley, under an act of Congress, in 1825. Fort Leavenworth was established in 1827. The Baptist Shawnee Mission, near Wyandotte, was established in 1831. The Methodist Shawnee Mission dates from 1832, and the Friends' from 1833.

The first printing-press was sent to Kansas in 1834, by the Baptist Home Mission Society, of New York, in charge of Rev. Joseph Meeker, and was located at the Baptist Mission Farm, five miles north-east of Ottawa, in Franklin County.

Kansas was organized as a territory by act of Congress, May 30, 1854. The law of 1820, declaring it free, was nullified, and the new law opened it to freedom or slavery, as its settlers might vote. This was called popular or squatter sovereignty. It was a pretence to establish slavery in Kansas. The territory was the creature of the general government; that government was pro-slavery, and kept Kansas so until she became a State, by Republican votes, that party having obtained a national victory in November, 1860. The territorial governors, judges, and marshals were appointed by slavery, and they, by legal and illegal means, kept slavery here.

The North and South entered into a contest to people the territory. The North out-emigrated the South. The contest led to a civil war in Kansas. In this war two hundred lives were lost, and not less than two millions in money.

A census taken in February, 1855, showed a population of eight thousand six hundred and one. In October, 1855, the Free State men met in Topeka and formed a Constitution. Officers were elected under it, legislatures met, laws were passed but not enforced, and the movement served only to unite and give power and efficiency to the Free State party.

At a later day the national House voted to admit Kansas under this Constitution; but the Senate did not become a free body until made so by secession, in 1861, and constantly spurned the appeals of Free Kansas.

The final national victory, the election of Abraham Lincoln, seemed to the South so decisive a triumph for freedom that she could save slavery only by a separate confederacy. This determination continued the war in Kansas, and gave birth to her second army of heroes,—the volunteer soldiers of the civil war. These came without bounties, without a draft, and in larger proportionate numbers than any other State gave with bounties and with forced conscriptions.

From 1854 to 1865, the war was in Kansas. Houses were burned, fields laid waste, printing-presses mobbed, whole towns destroyed, and hundreds of citizens massacred. No other State in the Union has had so turbulent, so painful, so heroic a history.

During the year 1854, the towns of Leavenworth, Lawrence, Topeka, and Atchison were founded. Emigration to the territory was quite brisk the next year, and the country improved rapidly, but the feuds between the Free State and Pro-slavery parties having risen to blood-heat during the fall of that year, and sacking, killing, and murdering being the order of the day, emigration was impeded, and for the next eighteen months but few permanent accessions were made to the population of the territory. In the spring of 1857, the tide of emigration was greater than it had been in the previous history of the territory. In the fall of that year it was estimated that we had a population of sixty thousand.

Charles Sumner, speaking of the Kansas of this period, said in the United States Senate:—

Take down your map, sir, and you will find that the Territory of Kansas, more than any other region, occupies the middle spot of North America, equally distant from the Atlantic on the east and the Pacific on the west; from the frozen waters of Hudson's Bay on the north and from the tepid Gulf Stream on the south,—constituting the precise territorial centre of the whole vast continent. To such advantage of situation, on the very highway between two oceans, are added a soil of unsurpassed richness, and a fascinating, undulating beauty of surface, with a health-giving climate calculated to nurture a powerful and generous people; worthy to be a central pivot of American institutions. A few short months only have passed since this spacious mediterranean country was open only to the savage, who ran wild in its woods and prairies; and now it has already drawn to its bosom a population of freemen larger than Athens crowded within her historic gates, when her sons, under Miltiades, won liberty for mankind on the field of Marathon; more than Sparta contained when she ruled Greece, and sent forth her devoted children, quickened by a mother's benediction, to return with their shields or on them; more than Rome gathered on her seven hills, when, under her kings, she commenced that sovereign sway which afterward embraced the whole earth; more than London held, when on the fields of Cressy and Agincourt, the English banner was carried victoriously over the chivalrous hosts of France.

From 1860 till 1865 — the civil-war period,— there was but small emigration to Kansas. Our exposed position to the main enemy and the Indians

caused thousands to leave the State, while thousands of lives, constituting the best blood of this grand and heroic commonwealth, were sacrificed on the altar of our country.

On the 29th of January, 1861, after a long and bitter conflict in Congress, Kansas was admitted into the Federal Union. She had already formed a Constitution and elected a State government. Her first Governor was sworn into office Feb. 9, 1861, on the same day that Jefferson Davis was elected provisional President of the Southern Confederacy, and two days before Abraham Lincoln left Springfield for Washington to assume the duties of the presidential office.

The report of the Adjutant-General, in 1865, credited Kansas with having contributed to the Union armies 21,806 men. In 1861, the vote of the State was only 14,461. In 1864, the vote of the State was 21,835. History will be searched in vain for a parallel to this patriotism and this growth, — this combination of heroic faith in the Union and in Kansas. What other State mustered more soldiers than it had voters? The three States which show the highest mortality in the war are Kansas, Vermont, and Massachusetts. The proportion per thousand was as follows: Kansas, 61.01; Vermont, 58.22; Massachusetts, 47.76.

But through all these disasters Kansas grew larger. The little strip of cultivated fields along the Missouri border kept growing wider and wider, until it broadened to the centre, and beyond the centre, of the State. There was a fascination in the fruitful fields and cheerful climate which held the family to the farm while the plowman had "gone for a soldier." The soldiers of other States who came here during the war returned to become citizens when the war was over.

And it was not the North only that came to free Kansas. There were carpet-baggers and ku-klux in the South; there were free schools, free lands, a brave and generous people in Kansas. The men of the South came here, rejoicing with our pioneers in the establishment of free institutions on these broad prairies. Five years after the close of the war, one person out of every five in Kansas was a native of the South. In 1870, the total population was 364,399; of this number, 73,925 were born in the Southern States. These citizens are among our most earnest and efficient promoters of every good cause. Their numbers have constantly increased since that date.

Kansas did not become a State until January, 1861, and the era of peace did not begin until the close of the war in 1865, thirteen years ago. Considering her youth, her growth has been marvellous and unparalleled. Her census figures may be tabulated thus:—

In 1855, February	 8,601
In 1860, June	
In 1865, June	
In 1870, June	
In 1875, March	
In 1877, March.	 592,916

The gain in the decade from 1860 to 1870 was 239.90 per cent., — a greater

increase than any other State made. Minnesota gained in that decade 155.61 per cent.; Iowa, 76.91 per cent.; Oregon, 73.30 per cent.; Illinois, 48.36 per cent.; and Missouri 45.62 per cent. Maine and South Carolina increased less than one per cent. each in that decade. The average for all the States and territories was 25.52 per cent.

In 1860, Kansas ranked thirty-third, in 1870, twenty-ninth, among the States in population. In the decade from 1860 to 1870, it more than trebled its population, and during the five years from 1870 to 1875 nearly doubled it. In 1860, only 372,825 of the 52,000,000 acres of land included within the limits of Kansas were under cultivation, and in 1874 the area cultivated amounted to 3,659,777 acres. In 1865, there was not a mile of railroad in the State, and now Kansas has two thousand three hundred and ten miles of completed railway lines traversing her territory.

In a letter to the New York *Tribune* from Kansas, dated Oct. 9, 1870, Horace Greeley wrote:—

Settlers are pouring into Eastern Kansas by car-loads, wagon-loads, horse-loads, daily, because of the fertility of her soil, the geniality of her climate, her admirable diversity of prairie and timber, the abundance of her living streams, and the marvellous facility wherewith homesteads may here be erected. . . . Kansas is going ahead magnificently, and I predict that the child is born who will see her fifth, if not fourth, in population and production among the States of our Union.

The rapid growth of the State since the last estimate would seem to show that his prediction will be fulfilled during the lifetime of many who have already attained their maturity.



The rudiments of empire here
Are plastic yet and warm;
The chaos of a mighty world
Is rounding into form!

Each rude and jostling fragment soon
The fitting place shall find,—
The raw material of a State,
Its muscle and its mind!

Whittier.

GEO. H. ELLIS, PRINTER, BOSTON

ATCHISON, TOPEKA & SANTA FÉ R.R. Co.

DIRECTORS

CHOSEN AT THE

ANNUAL MEETING, MAY 16, 1878.

THOMAS NICKERSON, 1	Boston,	Mass.	B. P. CHENEY, Boston, Mass.
Joseph Nickerson,	"	"	CHARLES W. PIERCE, Boston, Mass.
ISAAC T. BURR,	"	66	C. K. HOLIDAY, Topeka, Kan.
ALDEN SPEARE,	"	66 .	B. F. STRINGFELLOW, Atchison, Kan.
GEORGE B. WILBUR,	66	66	S. A. KENT, Chicago, Ill.
CHARLES J. PAINE,	66	"	THOMAS SHERLOCK, Cincinnati, O.
F. H. PEABODY,	"	66	L. SEVERY, Reading, Kan.

BOSTON OFFICE, 24 EQUITABLE BUILDING.

OFFICERS.

THOMAS NICKERSON, President, Boston, Mass.

W. B. STRONG, Vice-President and General Manager, Topeka, Kansas.

EDWARD WILDER, Secretary and Treasurer, Topeka, Kan.

GEO. L. GOODWIN, Assistant Treasurer, Boston, Mass.

ISAAC T. BURR, Chairman of Finance Committee, Boston, Mass.

NEW ENGLAND LAND OFFICE,

197 Washington Street, Boston.
J. R. WATSON, Agent.

GENERAL AGENTS.

For information as to routes, reduced rates on tickets and freight, and excursion dates, apply to nearest Agent in list given below:

C. A. SEYMOUR, General Agent	239 Broadway, New York.
JNO. L. TRUSLOW, General Agent	44 Louisiana St., Indianapolis.
SAMUEL B. HYNES, General Agent	402 Pine St., St. Louis.
M. SOLOMON, General Land Agent	46 South Clark St., Chicago.
H. C. FISH, General Land Agent	127 Vine St., Cincinnati.
H. L. CARGILL, District Agent	122 Market St., Philadelphia.
W. E. TUSTIN, District Agent	154 5th Ave., Pittsburgh.
H. KAHLO & CO., District Agents	46 Madison St., Toledo.
J. R. WATSON, New England Agent	197 Washington St., Boston.

Sub-Agencies in New England.

Pearl & Webb, 24 W. Market Sq., Bangor. Rollins, Lorin & Adams, 22 Exchange St., Portland.

Portland.
A. Bailey, Gardiner.
J. F. Boothby, Lewiston.
B. F. Eaton, Skowhegan.
D. W. C. Fulsom, Bucksport.
Chas. H. Greenleaf, Bath.
T. A. Gilkey, Belfast.
S. S. Ireland, Dexter.
G. F. Jennings, Farmington.
C. B. Morton, Augusta.
B. I. Weeks, Rockland.

NEW HAMPSHIRE.

J. J. & G. W. Barrett, Littleton. E. C. Converse, Newport. Crawford & Tolles, Great Falls. Henry Judkins, Claremont. Geo. Kimball, Keene. Geo. B. Prescott, Dover. John G. Kimball, Nashua.

RHODE ISLAND.

W. H. Crowningshield, Pawtucket. E. G. Windsor, Providence.

CONNECTICUT.

Ward W. Jacobs, Mechanics' Savings Bank, Hartford.

A. E. Bosworth, Springfield. Geo. O. Guild, Bellows Falls. Wm. S. Newton, Brattleborough. J. W. Page, Montpelier.

MASSACHUSETTS.

Geo. A. Brown, 197 Washington St., Boston. Bacheller & Parsons, Market St., Lynn. Geo. W. Aborn, Wakefield. C. J. Bellamy, Chicopee and Chicopee Falls. L. H. Cook, Milford. L. H. Cook, Millord.
J. F. Cotting, Mariborough,
E. W. Dickerman, Westfield.
Chas, M. Dinsmore, Clinton,
H. L. Follansbee, Gloucester,
J. W. Gay, Jr., Winchendon.
Green & Son, Fall River.
Hatch & Co., New Bedford.
Daniel Hooke, Haverhill.
Arthur H. Jones. Athol. Arthur H. Jones, Athol. Waldo Johnson, Webster. E. T. Jackson, Taunton. E. T. Jackson, Taunton.
Lockey & Dennis, Fitchburg.
Lockey & Dennis, Leominster.
E. M. Phillips, Southbridge.
C. B. Prescott, Holyoke.
W. E. Potter & Co., Lowell.
Albert D. Swann, Lawrence.
John F. Spring, Greenfield.
H. A. Saville, Rockport.
Oliver Walker, Northampton.

GENERAL INSTRUCTIONS

To those who intend Emigrating to Colorado, San Juan Mines, and the Southwestern Territories.

Read carefully, and if there is anything you do not understand, show this to the nearest Railroad Station Agent and he will explain.

1. Emigrants are carried on regular first-class express trains with second-class accommodations at an average of about two cents per mile.

2. No cars are chartered for the transportation of passengers. Every passenger must hold a ticket at the rates quoted, without reference to the number travelling in a party.

3. In case a party of thirty or upwards are travelling together, there will be no difficulty in securing a special car without extra cost above the price of the tickets; but no reduction will be made on account of numbers.

reduction will be made on account of numbers.

4. Always secure your tickets as near your starting-point as possible, and you will save both time and money. Our tickets are on sale at all the principal railroad offices in the country, and the Agent will ticket you by the route you desire.

Passenger trains leave Kansas City and Atchison every day in the year on the arrival of trains from the East. The connection is made in Union Depots, and there are no delays or omnibus transfers. The time to Topeka is 3 hours; Emporia, 6 hours; Kewton, 10 hours; Wichita, 12 hours; Hutchinson, 12 hours; Sterling, 13 hours; Great Bend, 14 hours: Larned, 15 hours; Kinsley, 16 hours; Dodge City, 17 hours; Pueblo, 27½ hours; Colorado Springs, 29 hours; Denver, 32 hours; El Moro, 32½ hours; Garland, 33 hours.

If this circular does not answer all your questions, write for additional details to

M. L. SARGENT,
General Freight Agent,
Topeka, Kansas.

M. F. WHITE, Gen'l Passenger and Ticket Agent, Topeka, Kansas

FARMS AND HOMES FOR ALL.

2,500,000

ACRES OF CHOICE LANDS FOR SALE

ARKANSAS VALLEY,

IN SOUTH-WEST KANSAS,

BY THE

ATCHISON, TOPEKA & SANTA FÉ R.R. CO.

THE MOST DESIRABLE ROUTE

COLORADO, NEW MEXICO, AND ARIZONA

IS BY THE A. T. & S. F. R. R.

1121 11. 1. 60 0. 1. 10. 10.

UNRIVALLED for COMFORT for TOURIST TRAVEL

BY ANY ROAD IN THE COUNTRY.

NO CHANGE OF PULLMAN CARS

FROM THE

MISSOURI RIVER TO THE MOUNTAINS

The Car "GRANADA," famous for the admiration it excited at the Centennial, at Philadelphia I ullman's masterpiecei, is one of the regular line of coaches, built expressly for this road, and all the others are its equal in superb appointment, magnificent finish, and perfect arrangement







